

10/141,986

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NEWS	1		Web Page for STN Seminar Schedule - N. America
NEWS	2	JAN 02	STN pricing information for 2008 now available
NEWS	3	JAN 16	CAS patent coverage enhanced to include exemplified prophetic substances
NEWS	4	JAN 28	USPATFULL, USPAT2, and USPATOLD enhanced with new custom IPC display formats
NEWS	5	JAN 28	MARPAT searching enhanced
NEWS	6	JAN 28	USGENE now provides USPTO sequence data within 3 days of publication
NEWS	7	JAN 28	TOXCENTER enhanced with reloaded MEDLINE segment
NEWS	8	JAN 28	MEDLINE and LMEDLINE reloaded with enhancements
NEWS	9	FEB 08	STN Express, Version 8.3, now available
NEWS	10	FEB 20	PCI now available as a replacement to DPCI
NEWS	11	FEB 25	IFIREF reloaded with enhancements
NEWS	12	FEB 25	IMSPRODUCT reloaded with enhancements
NEWS	13	FEB 29	WPINDEX/WPIDS/WPIX enhanced with ECLA and current U.S. National Patent Classification
NEWS	14	MAR 31	IFICDB, IFIPAT, and IFIUIDB enhanced with new custom IPC display formats
NEWS	15	MAR 31	CAS REGISTRY enhanced with additional experimental spectra
NEWS	16	MAR 31	CA/CAPplus and CASREACT patent number format for U.S. applications updated
NEWS	17	MAR 31	LPCI now available as a replacement to LDPCI
NEWS	18	MAR 31	EMBASE, EMBAL, and LEMBASE reloaded with enhancements
NEWS	19	APR 04	STN AnaVist, Version 1, to be discontinued
NEWS	20	APR 15	WPIDS, WPINDEX, and WPIX enhanced with new predefined hit display formats
NEWS	21	APR 28	EMBASE Controlled Term thesaurus enhanced
NEWS	22	APR 28	IMSRESEARCH reloaded with enhancements
NEWS	23	MAY 30	INPAFAMDB now available on STN for patent family searching
NEWS	24	MAY 30	DGENE, PCTGEN, and USGENE enhanced with new homology sequence search option
NEWS	25	JUN 06	EPFULL enhanced with 260,000 English abstracts
NEWS	26	JUN 06	KOREAPAT updated with 41,000 documents
NEWS	27	JUN 13	USPATFULL and USPAT2 updated with 11-character patent numbers for U.S. applications
NEWS	28	JUN 19	CAS REGISTRY includes selected substances from web-based collections
NEWS	29	JUN 25	CA/CAPplus and USPAT databases updated with IPC

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reclassification data
NEWS 30 JUN 30 AEROSPACE enhanced with more than 1 million U.S.
patent records
NEWS 31 JUN 30 EMBASE, EMBAL, and LEMBASE updated with additional
options to display authors and affiliated
organizations
NEWS 32 JUN 30 STN on the Web enhanced with new STN AnaVist
Assistant and BLAST plug-in
NEWS 33 JUN 30 STN AnaVist enhanced with database content from EPFULL

NEWS EXPRESS JUNE 27 08 CURRENT WINDOWS VERSION IS V8.3,
AND CURRENT DISCOVER FILE IS DATED 23 JUNE 2008.

NEWS HOURS STN Operating Hours Plus Help Desk Availability
NEWS LOGIN Welcome Banner and News Items
NEWS IPC8 For general information regarding STN implementation of IPC 8

Enter NEWS followed by the item number or name to see news on that
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* * * * * STN Columbus * * * * *

FILE 'HOME' ENTERED AT 15:42:45 ON 03 JUL 2008

=> FIL REGISTRY

COST IN U.S. DOLLARS	SINCE FILE ENTRY	TOTAL SESSION
FULL ESTIMATED COST	0.63	0.63

FILE 'REGISTRY' ENTERED AT 15:44:21 ON 03 JUL 2008

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STRUCTURE FILE UPDATES: 2 JUL 2008 HIGHEST RN 1032450-11-5

DICTIONARY FILE UPDATES: 2 JUL 2008 HIGHEST RN 1032450-11-5

New CAS Information Use Policies, enter HELP USAGETERMS for details.

TSCA INFORMATION NOW CURRENT THROUGH January 9, 2008.

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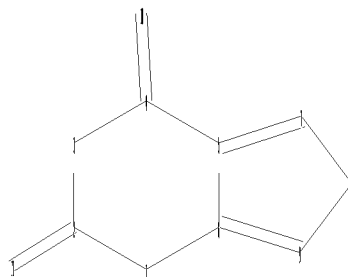
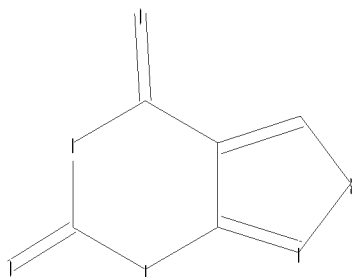
REGISTRY includes numerically searchable data for experimental and
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=>

Uploading C:\Program Files\Stnexp\Queries\10597860.str



chain nodes :

10 11

ring nodes :

1 2 3 4 5 6 7 8 9

chain bonds :

2-11 4-10

ring bonds :

1-2 1-6 2-3 3-4 4-5 5-6 5-7 6-9 7-8 8-9

exact/norm bonds :

1-2 1-6 2-3 2-11 3-4 4-5 4-10 5-6 5-7 6-9 7-8 8-9

Match level :

1:Atom 2:Atom 3:Atom 4:Atom 5:Atom 6:Atom 7:Atom 8:Atom 9:Atom 10:CLASS

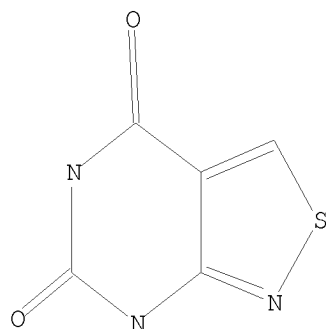
11:CLASS

L1 STRUCTURE UPLOADED

=> d

L1 HAS NO ANSWERS

L1 STR



Structure attributes must be viewed using STN Express query preparation.

10/141,986

=> s l1 sam

SAMPLE SEARCH INITIATED 15:44:46 FILE 'REGISTRY'

SAMPLE SCREEN SEARCH COMPLETED - 30 TO ITERATE

100.0% PROCESSED 30 ITERATIONS

3 ANSWERS

SEARCH TIME: 00.00.01

FULL FILE PROJECTIONS: ONLINE **COMPLETE**

BATCH **COMPLETE**

PROJECTED ITERATIONS: 272 TO 928

PROJECTED ANSWERS: 3 TO 163

L2 3 SEA SSS SAM L1

=> s l1 ful

FULL SEARCH INITIATED 15:44:53 FILE 'REGISTRY'

FULL SCREEN SEARCH COMPLETED - 606 TO ITERATE

100.0% PROCESSED 606 ITERATIONS

111 ANSWERS

SEARCH TIME: 00.00.01

L3 111 SEA SSS FUL L1

=> fil capl

COST IN U.S. DOLLARS

SINCE FILE

TOTAL

ENTRY

SESSION

FULL ESTIMATED COST

178.36

178.99

FILE 'CAPLUS' ENTERED AT 15:44:59 ON 03 JUL 2008

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FILE COVERS 1907 - 3 Jul 2008 VOL 149 ISS 1

FILE LAST UPDATED: 2 Jul 2008 (20080702/ED)

Caplus now includes complete International Patent Classification (IPC) reclassification data for the second quarter of 2008.

Effective October 17, 2005, revised CAS Information Use Policies apply. They are available for your review at:

<http://www.cas.org/legal/infopolicy.html>

=> s l3

10/141,986

L4 24 L3

=> s l4 not (2008so or 2007/so or 2006/so or 2005/so)

0 2008SO

941580 2007/SO

943642 2006/SO

884541 2005/SO

L5 23 L4 NOT (2008SO OR 2007/SO OR 2006/SO OR 2005/SO)

=> s l4 not (2008/so or 2007/so or 2006/so or 2005/so)

402651 2008/SO

941580 2007/SO

943642 2006/SO

884541 2005/SO

L6 23 L4 NOT (2008/SO OR 2007/SO OR 2006/SO OR 2005/SO)

=> d l6 ibib hitstr abs 1-23

L6 ANSWER 1 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2005:902901 CAPLUS

DOCUMENT NUMBER: 143:229880

TITLE: Preparation of isothiazolopyrimidinediones as parathyroid hormone type I receptor (PTH1R) agonists for treatment of osteoporosis.

INVENTOR(S): Spearing, Paul Kenneth

PATENT ASSIGNEE(S): Smithkline Beecham Corporation, USA

SOURCE: PCT Int. Appl., 21 pp.

CODEN: PIXXD2

DOCUMENT TYPE: Patent

LANGUAGE: English

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2005077959	A1	20050825	WO 2005-US3247	20050203
W:	AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BW, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, EG, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NA, NI, NO, NZ, OM, PG, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, SY, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW			
RW:	BW, GH, GM, KE, LS, MW, MZ, NA, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IS, IT, LT, LU, MC, NL, PL, PT, RO, SE, SI, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG			
EP 1713815	A1	20061025	EP 2005-712622	20050203
R:	AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, CY, TR, BG, CZ, EE, HU, PL, SK, HR, IS			
JP 2007522214	T	20070809	JP 2006-553161	20050203
US 20070099940	A1	20070503	US 2006-597860	20060810
PRIORITY APPLN. INFO.:			US 2004-543764P	P 20040211
			WO 2005-US3247	W 20050203

OTHER SOURCE(S): CASREACT 143:229880; MARPAT 143:229880

IT 52903-32-9P 862980-97-0P

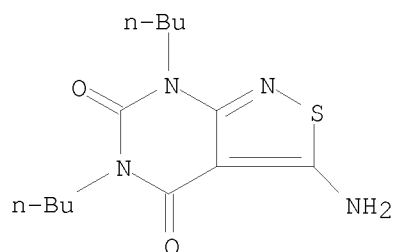
RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

(claimed compound; preparation of isothiazolopyrimidinediones as parathyroid hormone type I receptor agonists for treatment of osteoporosis)

RN 52903-32-9 CAPLUS

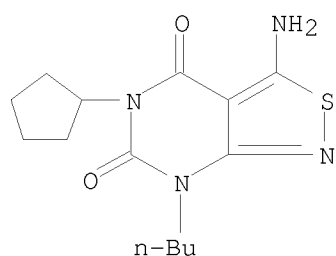
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-5,7-dibutyl- (CA INDEX NAME)

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RN 862980-97-0 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-7-butyl-5-cyclopentyl- (CA INDEX NAME)



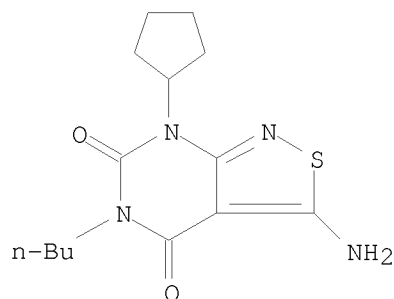
IT 862981-03-1P

RL: PAC (Pharmacological activity); SPN (Synthetic preparation); THU (Therapeutic use); BIOL (Biological study); PREP (Preparation); USES (Uses)

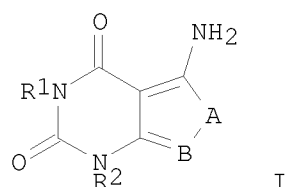
(preparation of isothiazolopyrimidinediones as parathyroid hormone type I receptor agonists for treatment of osteoporosis)

RN 862981-03-1 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-5-butyl-7-cyclopentyl- (CA INDEX NAME)



GI



AB Title compds. [I; A, B = S, O, N, CH; R1, R2 = (substituted) alkyl, alkylene, cycloalkyl, aryl, heteroaryl, heterocycloalkyl, cycloalkylaryl, heterocycloaryl], were prepared Thus, 6-amino-1,3-dibutyl-1H-pyrimidine-2,4-dione in DMF was treated with 1-isothiocyanato-4-methoxybenzene at 23° followed by stirring at 100° for 16 h to give 70% 6-amino-1,3-dibutyl-N-(4-methoxybenzyl)-2,3-dioxo-1,2,3,4-tetrahydropyrimidine-5-carbothioamide. The latter in CHCl₃ was treated with Br₂ followed by stirring for 36 h at 23° to give 34% 3-amino-5,7-dibutylisothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione. I showed binding to PTH1R in membrane prepns. of HEK cells with IC₅₀ = 2-3 μM.

REFERENCE COUNT: 1 THERE ARE 1 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L6 ANSWER 2 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2003:50046 CAPLUS

DOCUMENT NUMBER: 138:255198

TITLE: Novel Synthesis and Reactions of 5,7-Dialkyl-4,6-dioxo-4,5,6,7-tetrahydroisothiazolo[3,4,-d]pyrimidine-3-carbonitriles and 6-Methyl-4-oxo-4H-1-aza-5-oxa-2-thiaindene-3-carbonitrile

AUTHOR(S): Chang, Yong-Goo; Cho, Hyong Soon; Kim, Kyongtae

CORPORATE SOURCE: School of Chemistry and Molecular Engineering, Seoul National University, Seoul, 151-742, S. Korea

SOURCE: Organic Letters (2003), 5(4), 507-510

CODEN: ORLEF7; ISSN: 1523-7060

PUBLISHER: American Chemical Society

DOCUMENT TYPE: Journal

LANGUAGE: English

OTHER SOURCE(S): CASREACT 138:255198

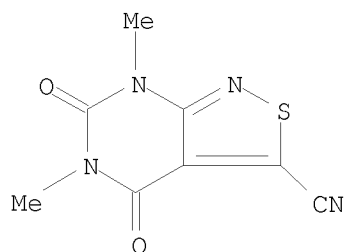
IT 502793-19-3P

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)

(preparation and substitution of 5,7-dialkyl-4,6-dioxo-4,5,6,7-tetrahydroisothiazolo[3,4,-d]pyrimidine-3-carbonitriles and 6-methyl-4-oxo-4H-1-aza-5-oxa-2-thiaindene-3-carbonitrile)

RN 502793-19-3 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-3-carbonitrile, 4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxo- (CA INDEX NAME)



IT 502793-20-6P 502793-21-7P 502793-22-8P

502793-23-9P 502793-24-0P 502793-25-1P

502793-26-2P 502793-27-3P 502793-28-4P

502793-29-5P 502793-30-8P 502793-31-9P

502793-32-0P 502793-33-1P 502793-34-2P

502793-35-3P

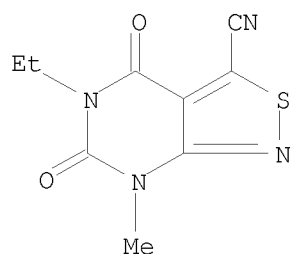
RL: SPN (Synthetic preparation); PREP (Preparation)

(preparation and substitution of 5,7-dialkyl-4,6-dioxo-4,5,6,7-tetrahydroisothiazolo[3,4,-d]pyrimidine-3-carbonitriles and 6-methyl-4-oxo-4H-1-aza-5-oxa-2-thiaindene-3-carbonitrile)

RN 502793-20-6 CAPLUS

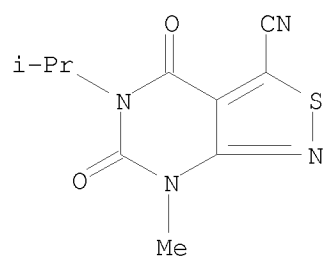
CN Isothiazolo[3,4-d]pyrimidine-3-carbonitrile, 5-ethyl-4,5,6,7-tetrahydro-7-methyl-4,6-dioxo- (CA INDEX NAME)

10/141,986



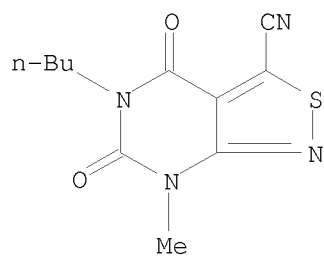
RN 502793-21-7 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-3-carbonitrile, 4,5,6,7-tetrahydro-7-methyl-5-(1-methylethyl)-4,6-dioxo- (CA INDEX NAME)



RN 502793-22-8 CAPLUS

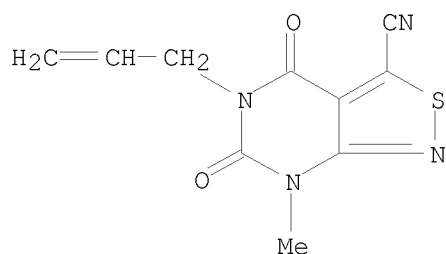
CN Isothiazolo[3,4-d]pyrimidine-3-carbonitrile, 5-butyl-4,5,6,7-tetrahydro-7-methyl-4,6-dioxo- (CA INDEX NAME)



RN 502793-23-9 CAPLUS

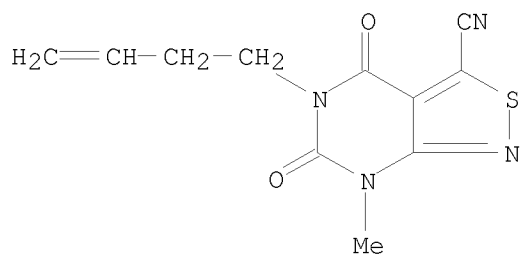
CN Isothiazolo[3,4-d]pyrimidine-3-carbonitrile, 4,5,6,7-tetrahydro-7-methyl-4,6-dioxo-5-(2-propen-1-yl)- (CA INDEX NAME)

10/141,986



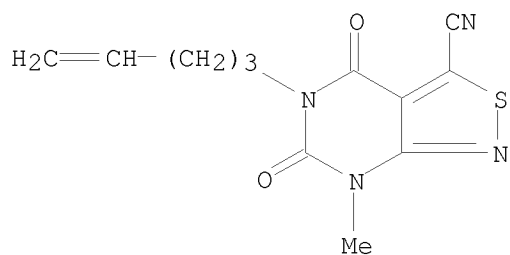
RN 502793-24-0 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-3-carbonitrile, 5-(3-buten-1-yl)-4,5,6,7-tetrahydro-7-methyl-4,6-dioxo- (CA INDEX NAME)



RN 502793-25-1 CAPLUS

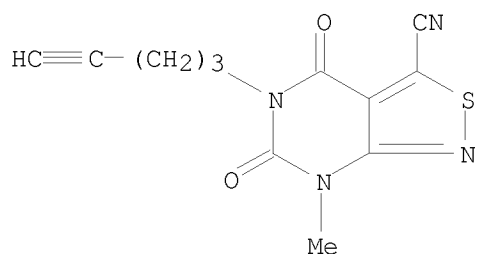
CN Isothiazolo[3,4-d]pyrimidine-3-carbonitrile, 4,5,6,7-tetrahydro-7-methyl-4,6-dioxo-5-(4-penten-1-yl)- (CA INDEX NAME)



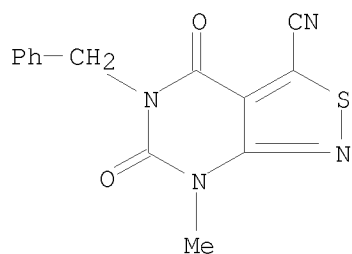
RN 502793-26-2 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-3-carbonitrile, 4,5,6,7-tetrahydro-7-methyl-4,6-dioxo-5-(4-pentyn-1-yl)- (CA INDEX NAME)

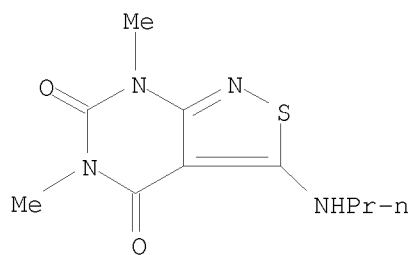
10/141,986



RN 502793-27-3 CAPLUS
CN Isothiazolo[3,4-d]pyrimidine-3-carbonitrile, 4,5,6,7-tetrahydro-7-methyl-4,6-dioxo-5-(phenylmethyl)- (CA INDEX NAME)

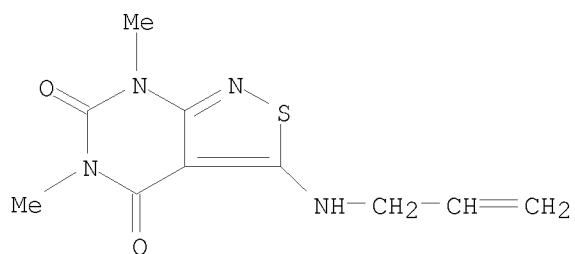


RN 502793-28-4 CAPLUS
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-(propylamino)- (CA INDEX NAME)



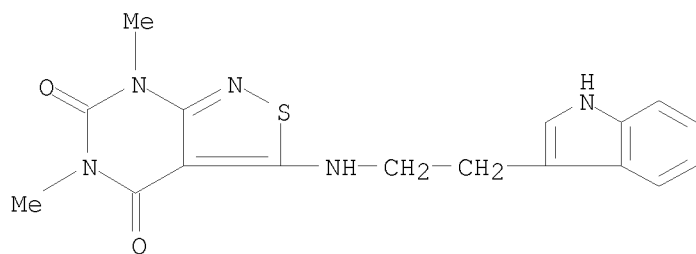
RN 502793-29-5 CAPLUS
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-(2-propen-1-ylamino)- (CA INDEX NAME)

10/141,986



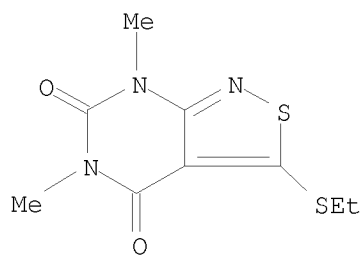
RN 502793-30-8 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-[[2-(1H-indol-3-yl)ethyl]amino]-5,7-dimethyl- (CA INDEX NAME)



RN 502793-31-9 CAPLUS

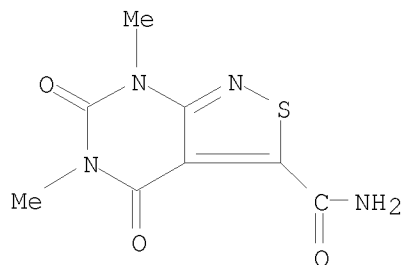
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(ethylthio)-5,7-dimethyl- (CA INDEX NAME)



RN 502793-32-0 CAPLUS

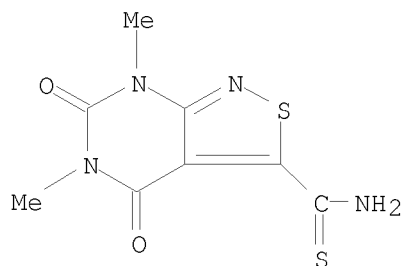
CN Isothiazolo[3,4-d]pyrimidine-3-carboxamide, 4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxo- (CA INDEX NAME)

10/141,986



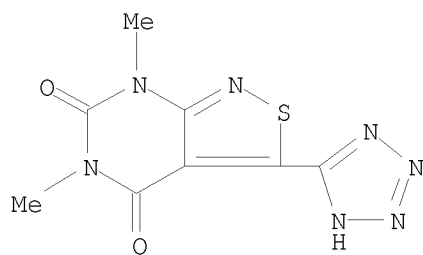
RN 502793-33-1 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-3-carbothioamide, 4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxo- (CA INDEX NAME)



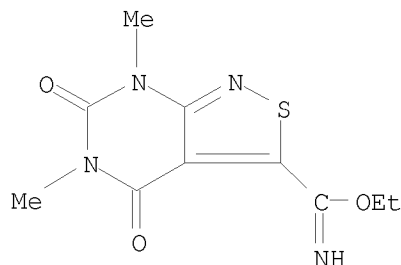
RN 502793-34-2 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-(2H-tetrazol-5-yl)- (CA INDEX NAME)



RN 502793-35-3 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-3-carboximidic acid, 4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxo-, ethyl ester (CA INDEX NAME)



AB 5,7-Dialkyl-4,6-dioxo-4,5,6,7-tetrahydroisothiazolo[3,4-d]pyrimidine-3-carbonitriles, prepared from 6-amino-1,3-dialkyluracils and 4,5-dichloro-5H-1,2,3-dithiazolium chloride (Appel's salt, I), are utilized for the preparation of new derivs. bearing amino, alkylthio, amido, thioamido, tetrazolyl, and carboximidic acid Et ester groups at position 3. Similarly, the reactions of 6-methyl-4-oxo-4H-1-aza-5-oxa-2-thiaindene-3-carbonitrile (II), prepared from 4-amino-6-methyl-2-pyrone and I, with alkyl- and arylamines in DMF at 50 °C and reflux afforded various isothiazole derivs. On the other hand, treatment of II with 1,3-diaminopropane in THF at room temperature, followed by chromatog. on silica gel, gave 3-(2-oxopropyl)-6,7,8-trihydro-4H-1-thia-2,5,9-triazacyclopentacyclononene-4,10-dione in 59% yield.

REFERENCE COUNT: 14 THERE ARE 14 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L6 ANSWER 3 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2002:890751 CAPLUS

DOCUMENT NUMBER: 138:287618

TITLE: Ring closure reactions of β -nitroso-,
 β -acyl-, and β -thiocarbamoyl- α,β -
 unsaturated sulfilimines. Synthesis of
 [1,2,5]oxadiazolo[3,4-d]-, isoxazolo[3,4-d]-, and
 isothiazolo[3,4-d]pyrimidine derivatives from uracils

AUTHOR(S): Matsumoto, Nobuaki; Takahashi, Masahiko

CORPORATE SOURCE: Faculty of Engineering, Department of Materials
 Science, Ibaraki University, Hitachi, Ibaraki,
 316-8511, Japan

SOURCE: Tetrahedron (2002), 58(50), 10073-10079

CODEN: TETRAB; ISSN: 0040-4020

PUBLISHER: Elsevier Science Ltd.

DOCUMENT TYPE: Journal

LANGUAGE: English

OTHER SOURCE(S): CASREACT 138:287618

IT 61851-90-9P 70425-00-2P 73123-40-7P

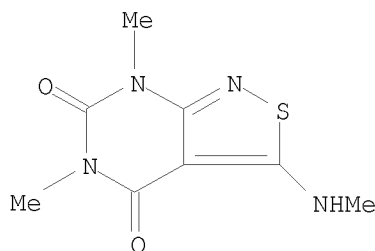
506437-27-0P 506437-28-1P

RL: SPN (Synthetic preparation); PREP (Preparation)

(preparation and ring closure reactions of β -nitroso-, β -acyl-,
 and β -thiocarbamoyl- α,β -unsatd. sulfilimines)

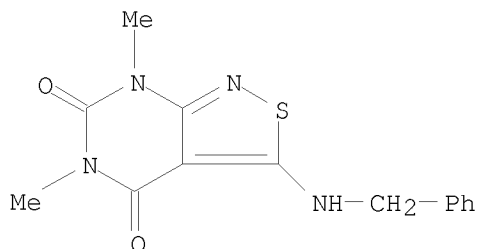
RN 61851-90-9 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-
 (methylamino)- (CA INDEX NAME)



RN 70425-00-2 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-
 [(phenylmethyl)amino]- (CA INDEX NAME)

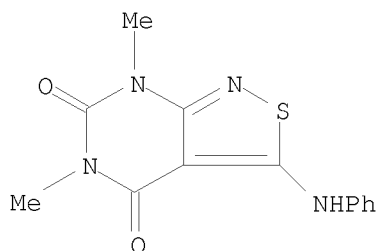


RN 73123-40-7 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-

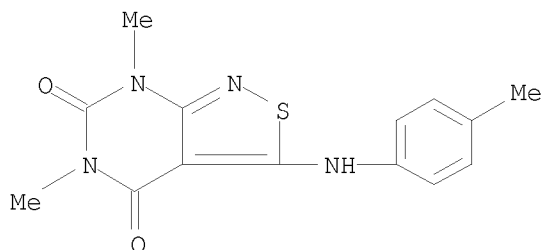
10/141,986

(phenylamino)- (CA INDEX NAME)



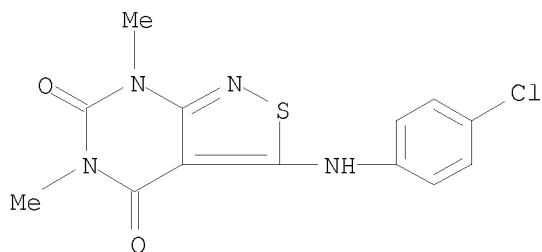
RN 506437-27-0 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[(4-methylphenyl)amino]- (CA INDEX NAME)



RN 506437-28-1 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-[(4-chlorophenyl)amino]-5,7-dimethyl- (CA INDEX NAME)



AB 1,3-Dialkyl-6-chlorouracils were treated with S,S-diphenylsulfilimine to give N-(1,3-dialkyluracil-6-yl)-S,S-diphenylsulfilimines. The uracilysulfilimines were nitrosated, acylated, or thiocarbamoylated to give N-(5-nitroso-, 5-acyl-, or 5-thiocarbamoyluracil-6-yl)sulfilimines, resp. These conjugated sulfilimines were cyclized by thermolysis or photolysis to [1,2,5]oxadiazolo[3,4-d]-isoxazolo[3,4-d]- or isothiazolo[3,4-d]pyrimidine derivs.

REFERENCE COUNT: 40 THERE ARE 40 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

10/141,986

L6 ANSWER 4 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1997:213322 CAPLUS

DOCUMENT NUMBER: 126:293309

ORIGINAL REFERENCE NO.: 126:56801a,56804a

TITLE: Reactivities of 6-amino-1,3-dimethyl-5-thioformyluracil toward nucleophiles and its application to synthesis of pyrido[2,3-d]pyrimidines

AUTHOR(S): Hirota, Kosaku; Kubo, Keiko; Sajiki, Hironao

CORPORATE SOURCE: Laboratory of Medicinal Chemistry, Gifu Pharmaceutical University, Gifu, 502, Japan

SOURCE: Chemical & Pharmaceutical Bulletin (1997), 45(3), 542-544

CODEN: CPBTAL; ISSN: 0009-2363

PUBLISHER: Pharmaceutical Society of Japan

DOCUMENT TYPE: Journal

LANGUAGE: English

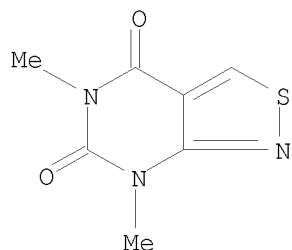
OTHER SOURCE(S): CASREACT 126:293309

IT 181465-22-5P

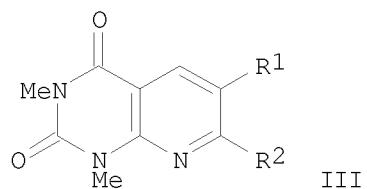
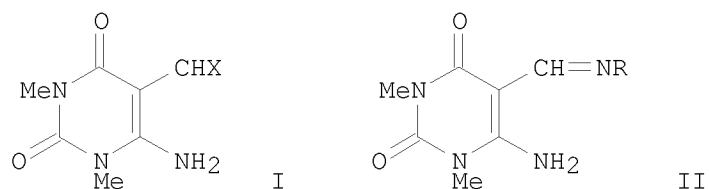
RL: SPN (Synthetic preparation); PREP (Preparation)
(reactions of thioformyluracil derivative with nucleophiles)

RN 181465-22-5 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl- (CA INDEX NAME)



GI



AB The reaction of the 5-thioformyluracil I (X = S) with phenylhydrazine and various amines readily afforded the hydrazone II (R = NHPH) and Schiff bases II (R = OH, Me, Ph), resp. Further, carbanions and Wittig reagents reacted with I (X = S) to give pyrido[2,3-d]pyrimidines III [R1 = cyano, CO₂Et, R₂ = NH₂; R₁ = CO₂Et, R₂ = OH; R₁ = H, R₂ = NH₂]. The corresponding 5-formyluracil I (X = O) possessed much lower reactivities toward these nucleophiles than did I (X = S).

REFERENCE COUNT: 34 THERE ARE 34 CITED REFERENCES AVAILABLE FOR THIS
RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L6 ANSWER 5 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1996:457576 CAPLUS

DOCUMENT NUMBER: 125:221422

ORIGINAL REFERENCE NO.: 125:41381a,41384a

TITLE: Stable thioaldehydes: synthesis, structure assignment, and stability of 6-amino-5-thioformyluracils

AUTHOR(S): Hirota, Kosaku; Sajiki, Hironao; Kubo, Keiko; Kido, Masaru; Nakagawa, Kazuyuki

CORPORATE SOURCE: Lab. of Medicinal Chemistry, Gifu Pharmaceutical Univ., Gifu, 502, Japan

SOURCE: Tetrahedron (1996), 52(30), 9971-9978

CODEN: TETRAB; ISSN: 0040-4020

PUBLISHER: Elsevier

DOCUMENT TYPE: Journal

LANGUAGE: English

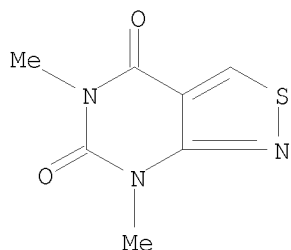
IT 181465-22-5P

RL: SPN (Synthetic preparation); PREP (Preparation)

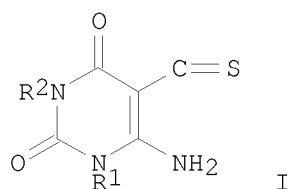
(preparation and properties of (amino)dioxypyrimidinecarbothioaldehydes)

RN 181465-22-5 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl- (CA INDEX NAME)



GI



AB Stable 6-amino-5-thioformyluracils (i.e., dioxypyrimidinecarbothioaldehydes) I (R1 = Me, Ph, Bu, etc.; R2 = Me, Pr) were synthesized starting from 6-amino-1,3-disubstituted uracils in 23-98% yields. According to the x-ray crystal structure, although I (R1 = Ph, R2 = Me) possessed reasonable double-bond character of the C=S bond, the length of C=S bond in I (R1 = Ph, R2 = Me) is longer than that in of kinetically stabilized thioaldehydes due to the mesomeric effect of the 6-amino group.

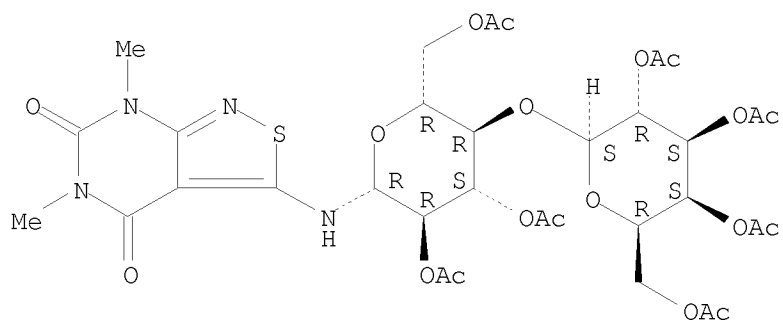
10/141,986

L6 ANSWER 6 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN
ACCESSION NUMBER: 1983:107682 CAPLUS
DOCUMENT NUMBER: 98:107682
ORIGINAL REFERENCE NO.: 98:16429a,16432a
TITLE: Glucoside derivatives
PATENT ASSIGNEE(S): Ogura, Haruo, Japan
SOURCE: Jpn. Kokai Tokkyo Koho, 13 pp.
CODEN: JKXXAF
DOCUMENT TYPE: Patent
LANGUAGE: Japanese
FAMILY ACC. NUM. COUNT: 1
PATENT INFORMATION:

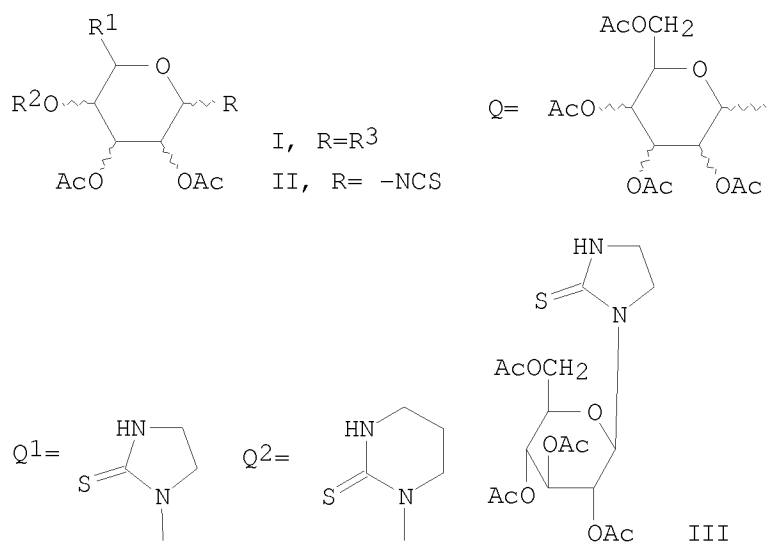
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 57146796	A	19820910	JP 1981-32498	19810309

PRIORITY APPLN. INFO.: JP 1981-32498 19810309
IT 80681-66-9P
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)
RN 80681-66-9 CAPLUS
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[[2,3,6-tri-O-acetyl-4-O-(2,3,4,6-tetra-O-acetyl-β-D-galactopyranosyl)-β-D-glucopyranosyl]amino]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



GI



AB Nineteen glycoside derivs. I [$R_1 = H, CH_2OH, CH_2OAc$; $R_2 = Ac, Q$; $R_3 = NHCSNHCH_2CH_2OH, NHCSNHNHCSNH_2, Q_1, Q_2$, etc.] were prepared by reaction of II with the corresponding amino compds. Thus, a mixture of 389 mg β -D-II ($R_1 = CH_2OAc, R_2 = Ac$) and 116 mg $ClCH_2CH_2NH_2 \cdot HCl$ in pyridine was stirred 3 h at room temperature to give 95% III.

L6 ANSWER 7 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1983:72644 CAPLUS

DOCUMENT NUMBER: 98:72644

ORIGINAL REFERENCE NO.: 98:11139a,11142a

TITLE: Syntheses of disaccharide isothiocyanates and nucleoside related compounds

AUTHOR(S): Ogura, Haruo; Takahashi, Hiroshi; Kobayashi, Minae

CORPORATE SOURCE: Sch. Pharm. Sci., Kitasato Univ., Tokyo, 108, Japan

SOURCE: Nippon Kagaku Kaishi (1982), (10), 1673-81

CODEN: NKAKB8; ISSN: 0369-4577

DOCUMENT TYPE: Journal

LANGUAGE: Japanese

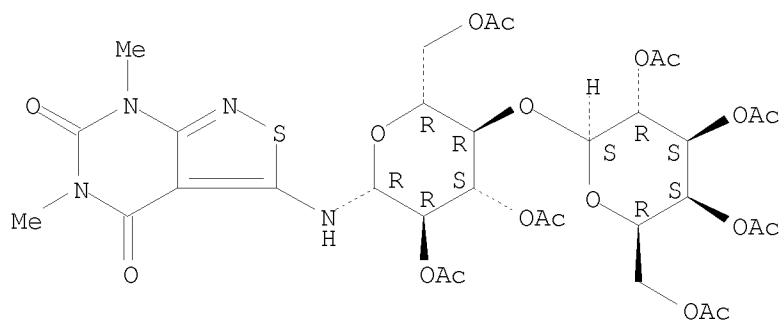
IT 80681-66-9P 84597-66-0P

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 80681-66-9 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[[2,3,6-tri-O-acetyl-4-O-(2,3,4,6-tetra-O-acetyl- β -D-galactopyranosyl)- β -D-glucopyranosyl]amino]- (9CI) (CA INDEX NAME)

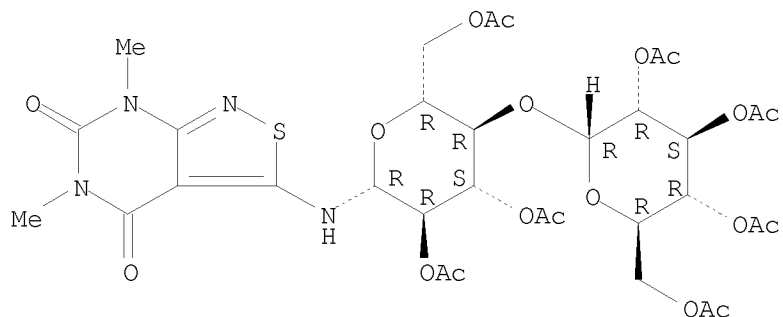
Absolute stereochemistry.



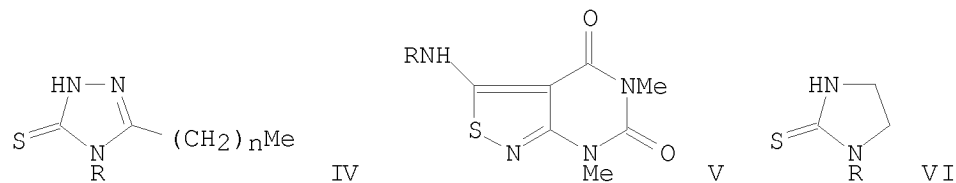
RN 84597-66-0 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[[2,3,6-tri-O-acetyl-4-O-(2,3,4,6-tetra-O-acetyl- α -D-glucopyranosyl)- β -D-glucopyranosyl]amino]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



GI



AB Modified nucleoside analogs were prepared starting from hepta-O-acetyl- β -lactosyl isothiocyanate (I), hepta-O-acetyl- β -maltosyl isothiocyanate (II), and hepta-O-acetyl- β -cellobiosyl isothiocyanate (III). I-III reacted with acylhydrazines to give $\text{RNHCSNHNHCO(CH}_2\text{)}_n\text{Me}$ (R = disaccharide residue), which afforded triazole disaccharides (IV) by treatment with $\text{Ac}_2\text{O-H}_3\text{PO}_4$ through cyclodehydration reaction. Reactions of I-III with 6-amino-1,3-dimethyluracil gave disaccharide aminoisothiazolopyrimidines (V) in good yields. Treatment of I-III with 2-amino-2-deoxy- β -D-glucopyranose yielded diglycosylthiureas. Reactions of I-III with chloroethylamine hydrochloride under basic conditions afforded disaccharide imidazolidinethiones (VI) instead of N-glycosyl-N'-chloroethylthiureas.

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L6 ANSWER 8 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1982:85908 CAPLUS

DOCUMENT NUMBER: 96:85908

ORIGINAL REFERENCE NO.: 96:14119a,14122a

TITLE: Synthetic O-glycosyl nucleoside analogs

AUTHOR(S): Ogura, Haruo; Furuhata, Fimio; Iwaki, Kazuo;
Takahashi, Hiroshi

CORPORATE SOURCE: Sch. Pharm. Sci., Kitasato Univ., Tokyo, 108, Japan

SOURCE: Nucleic Acids Symposium Series (1981), 10, 23-6

CODEN: NACSD8; ISSN: 0261-3166

DOCUMENT TYPE: Journal

LANGUAGE: English

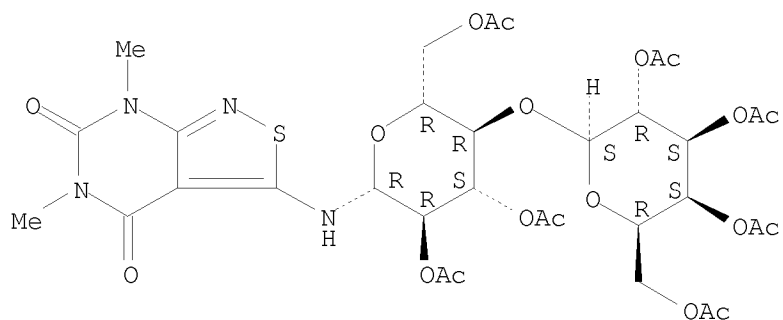
IT 80681-66-9P

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

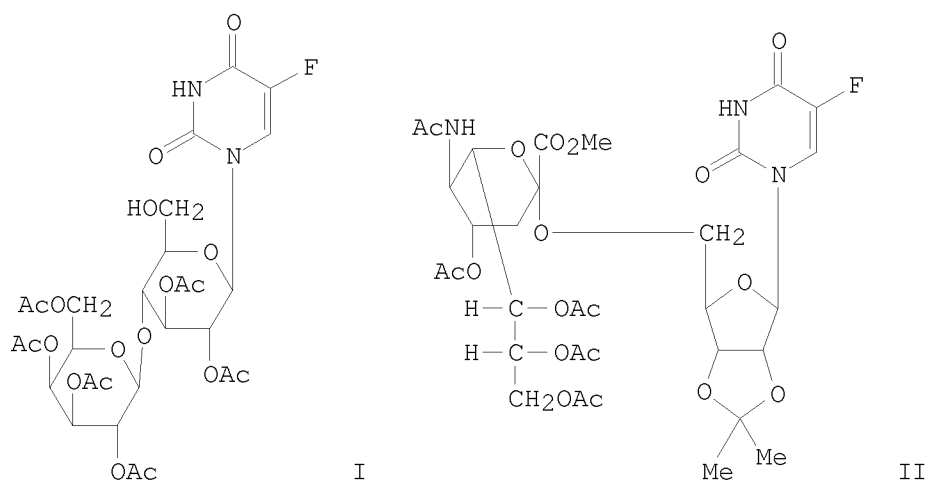
RN 80681-66-9 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[[2,3,6-tri-O-acetyl-4-O-(2,3,4,6-tetra-O-acetyl- β -D-galactopyranosyl)- β -D-glucopyranosyl]amino]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



GI



AB O-Glycosyl- and O-neuraminoylnucleosides, e.g., I and II, were prepared I was prepared by condensation of 1,6-anhydro-D-lactose hexaacetate with trimethylsilylated 5-fluorouracil in the presence of SnCl_4 . II was prepared by reaction of Me 2-chloro-4,7,8,9-tetra-O-acetyl-N-acetyl-D-neuramate with 2',3'-O-isopropylidene-5-fluorouridine.

L6 ANSWER 9 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1980:128845 CAPLUS

DOCUMENT NUMBER: 92:128845

ORIGINAL REFERENCE NO.: 92:21015a,21018a

TITLE: Enamino carbodithioates. III. Methyl
6-aminouracil-5-carbodithioates. 3. Synthesis and
reactions of 3-methylthioisothiazolo[3,4-d]-pyrimidine-
4,6(5H,7H)-diones

AUTHOR(S): Okuda, Hiroto; Tominaga, Yoshinori; Matsuda, Yoshiro;
Kobayashi, Goro

CORPORATE SOURCE: Fac. Pharm. Sci., Nagasaki Univ., Nagasaki, 852, Japan

SOURCE: Yakugaku Zasshi (1979), 99(10), 989-92

CODEN: YKKZAJ; ISSN: 0031-6903

DOCUMENT TYPE: Journal

LANGUAGE: Japanese

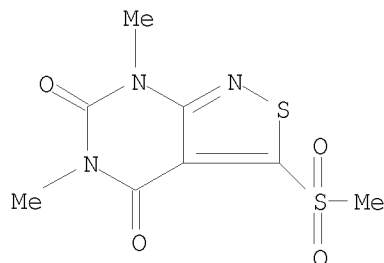
IT 73123-41-8P

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT
(Reactant or reagent)

(preparation and reactions with amines)

RN 73123-41-8 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-
(methylsulfonyl)- (CA INDEX NAME)



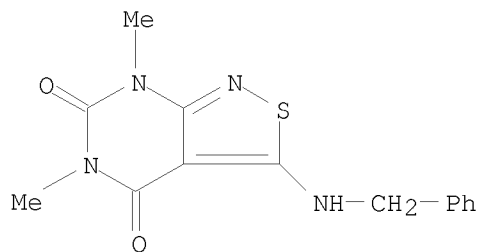
IT 70425-00-2P 70425-05-7P

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT
(Reactant or reagent)

(preparation and substitution reactions of)

RN 70425-00-2 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-
[(phenylmethyl)amino]- (CA INDEX NAME)

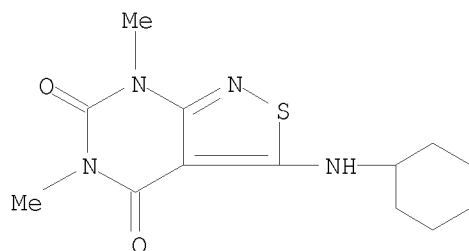


RN 70425-05-7 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(cyclohexylamino)-5,7-

10/141,986

dimethyl- (CA INDEX NAME)

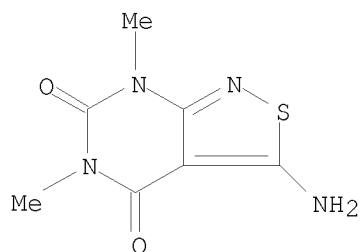


IT 52903-30-7P 52903-33-0P 61851-90-9P
70425-00-2P 70425-01-3P 70425-02-4P
70425-03-5P 70425-04-6P 70425-05-7P
70425-06-8P 70425-07-9P 70425-10-4P
70425-11-5P 70425-12-6P 70425-13-7P
73123-40-7P

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

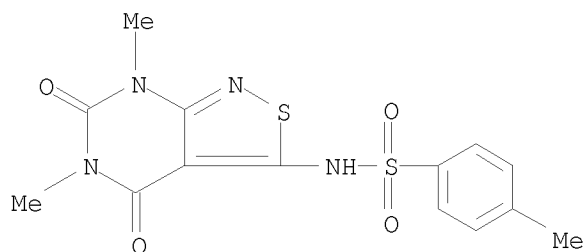
RN 52903-30-7 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-5,7-dimethyl- (CA INDEX NAME)



RN 52903-33-0 CAPLUS

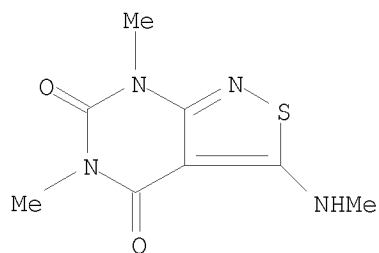
CN Benzenesulfonamide, 4-methyl-N-(4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)



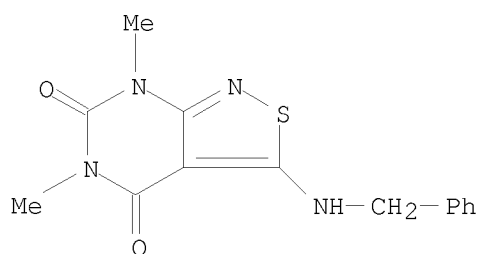
RN 61851-90-9 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-(methylamino)- (CA INDEX NAME)

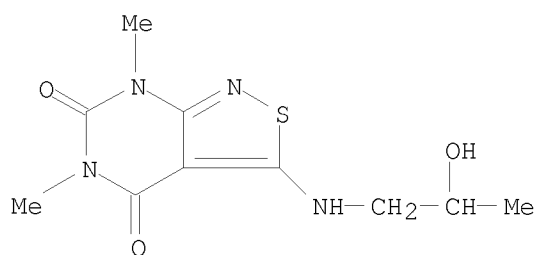
10/141,986



RN 70425-00-2 CAPLUS
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[(phenylmethyl)amino]- (CA INDEX NAME)

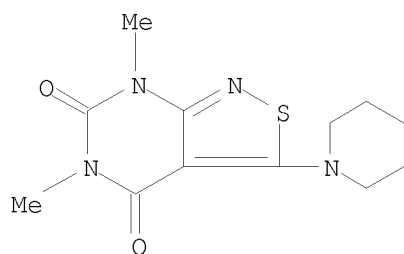


RN 70425-01-3 CAPLUS
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-[(2-hydroxypropyl)amino]-5,7-dimethyl- (CA INDEX NAME)



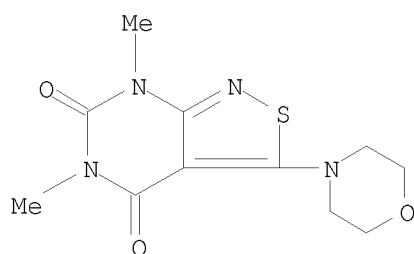
RN 70425-02-4 CAPLUS
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-(1-piperidinyl)- (CA INDEX NAME)

10/141,986



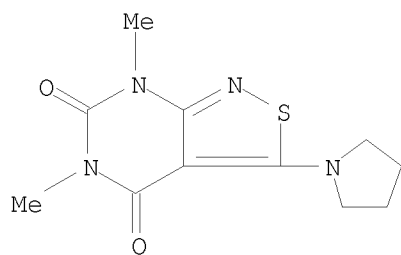
RN 70425-03-5 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-(4-morpholinyl)- (CA INDEX NAME)



RN 70425-04-6 CAPLUS

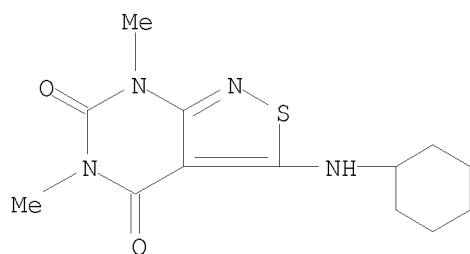
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-(1-pyrrolidinyl)- (CA INDEX NAME)



RN 70425-05-7 CAPLUS

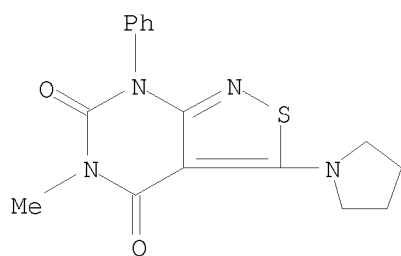
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(cyclohexylamino)-5,7-dimethyl- (CA INDEX NAME)

10/141,986



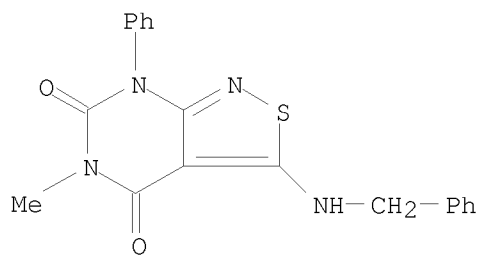
RN 70425-06-8 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5-methyl-7-phenyl-3-(1-pyrrolidinyl)- (CA INDEX NAME)



RN 70425-07-9 CAPLUS

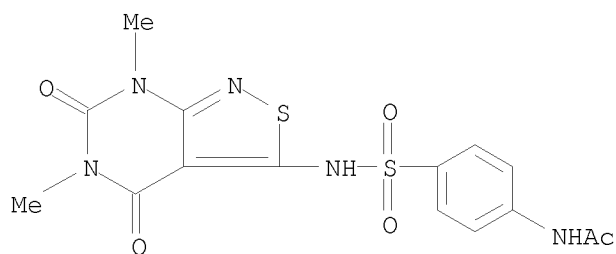
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5-methyl-7-phenyl-3-[(phenylmethyl)amino]- (CA INDEX NAME)



RN 70425-10-4 CAPLUS

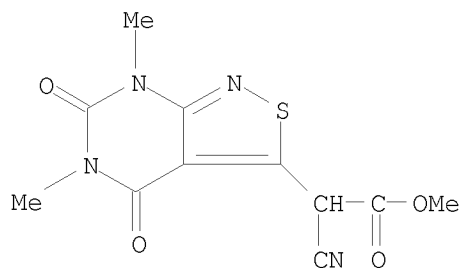
CN Acetamide, N-[4-[[[(4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)amino]sulfonyl]phenyl]- (CA INDEX NAME)

10/141,986



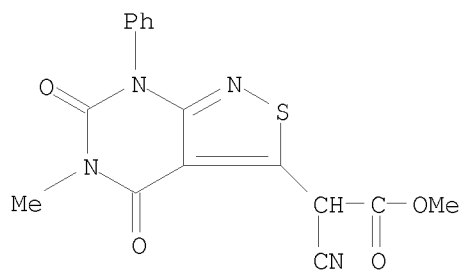
RN 70425-11-5 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-3-acetic acid, α -cyano-4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxo-, methyl ester (CA INDEX NAME)



RN 70425-12-6 CAPLUS

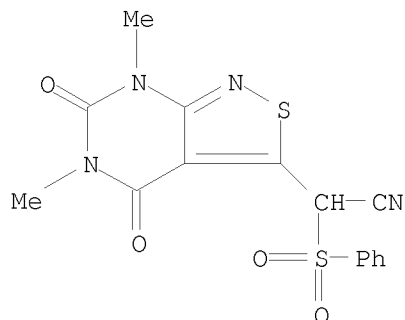
CN Isothiazolo[3,4-d]pyrimidine-3-acetic acid, α -cyano-4,5,6,7-tetrahydro-5-methyl-4,6-dioxo-7-phenyl-, methyl ester (CA INDEX NAME)



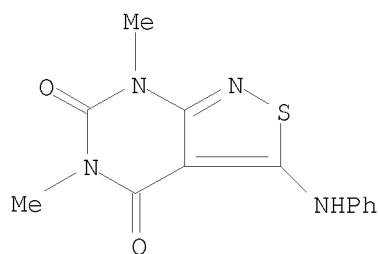
RN 70425-13-7 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-3-acetonitrile, 4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxo- α -(phenylsulfonyl)- (CA INDEX NAME)

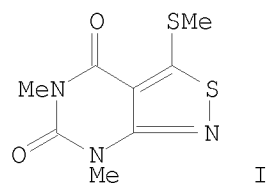
10/141,986



RN 73123-40-7 CAPLUS
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-(phenylamino)- (CA INDEX NAME)



GI



AB 3-Methylthioisothiazolopyrimidinediones I (R = Me, Ph) were prepared by treatment with Me 6-aminouracil-5-carbodithioates, prepared by the reaction of 6-aminouracil with CS₂ and Me₂SO₄ in the presence of alkali, with iodine in Me₂SO in a good yield. The reaction of I with amines, amides, and active methylene compds. gave the corresponding substituted products.

L6 ANSWER 10 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1980:22750 CAPLUS

DOCUMENT NUMBER: 92:22750

ORIGINAL REFERENCE NO.: 92:3877a,3880a

TITLE: Studies on heterocyclic compounds. Part XXIX. A one-step synthesis of glycosylaminoisothiazolo[3,4-d]pyrimidines and glycosylaminoisothiazoles

AUTHOR(S): Takahashi, Hiroshi; Nimura, Noriyuki; Ogura, Haruo
CORPORATE SOURCE: Sch. Pharm. Sci., Kitasato Univ., Tokyo, 108, Japan
SOURCE: Chemical & Pharmaceutical Bulletin (1979), 27(5), 1147-52

CODEN: CPBTAL; ISSN: 0009-2363

DOCUMENT TYPE: Journal

LANGUAGE: English

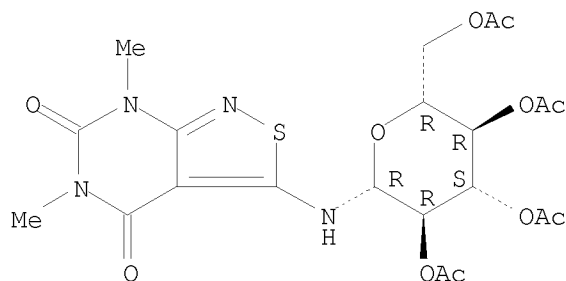
IT 58911-57-2P 62374-42-9P 62374-43-0P

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 58911-57-2 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[(2,3,4,6-tetra-O-acetyl- β -D-glucopyranosyl)amino]- (9CI) (CA INDEX NAME)

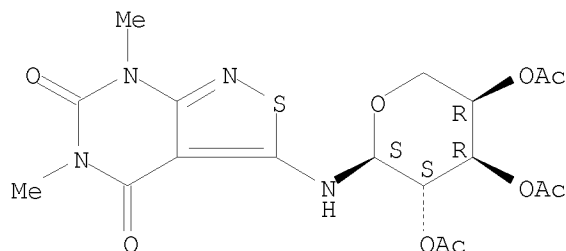
Absolute stereochemistry.



RN 62374-42-9 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[(2,3,4-tri-O-acetyl- α -D-arabinopyranosyl)amino]- (9CI) (CA INDEX NAME)

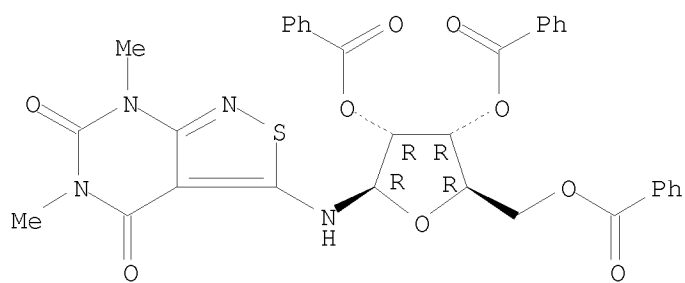
Absolute stereochemistry.



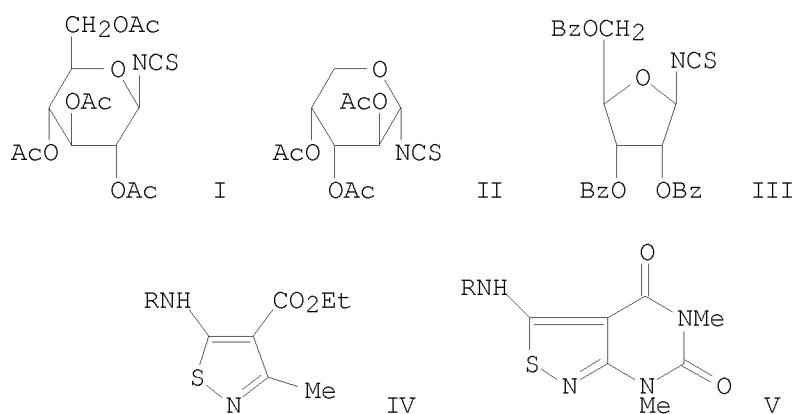
RN 62374-43-0 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[(2,3,5-tri-O-benzoyl- β -D-ribofuranosyl)amino]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



GI



AB The reaction of glycosyl isothiocyanate I with 2-aminopyridine or 2-amino-4-picoline gave N-glycosyl-N'-(2-pyridyl) thiourea and N-glycosyl-N'-(4-methyl-2-pyridyl) thiourea, resp., in good yields; cyclized products were not obtained. On the other hand, the reaction of glycosyl isothiocyanates I, II, and III with $\text{MeC}(\text{NH}_2):\text{CHCO}_2\text{Et}$ gave $\text{MeC}(\text{NH}_2):\text{C}(\text{CSNHR})\text{CO}_2\text{Et}$ (R = glycosyl) and nucleoside analogs IV (R = glycosyl). Similar reaction of I-III with 6-amino-1,3-dimethyluracil gave nucleoside analogs V.

10/141,986

L6 ANSWER 11 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1979:575307 CAPLUS

DOCUMENT NUMBER: 91:175307

ORIGINAL REFERENCE NO.: 91:28279a,28282a

TITLE: Enamino carbodithioates. I. Methyl
6-aminouracil-5-carbodithioates. 1. Synthesis and
reactions

AUTHOR(S): Tominaga, Yoshinori; Machida, Tsuyoshi; Okuda, Hiroto;
Matsuda, Yoshiro; Kobayashi, Goro

CORPORATE SOURCE: Fac. Pharm. Sci., Nagasaki Univ., Nagasaki, 852, Japan

SOURCE: Yakugaku Zasshi (1979), 99(5), 515-20

CODEN: YKKZAJ; ISSN: 0031-6903

DOCUMENT TYPE: Journal

LANGUAGE: Japanese

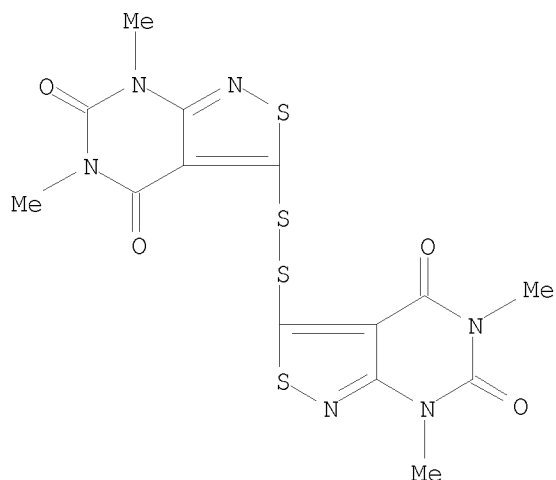
OTHER SOURCE(S): CASREACT 91:175307

IT 71266-55-2P

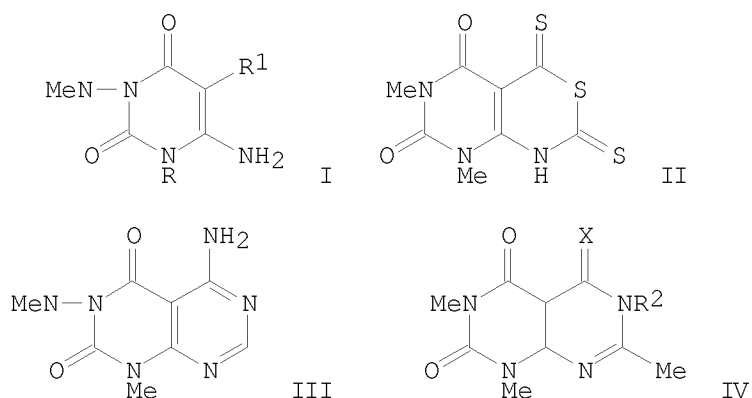
RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 71266-55-2 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3,3'-dithiobis[5,7-dimethyl-
(9CI) (CA INDEX NAME)



GI



AB The 6-aminouracils I (R = Me, Ph, R1 = H) treated with CS₂ and Me₂SO₄ in NaOH-DMSO gave dithiocarboxylates I (R = MePh; R1 = CS₂Me). An excess of CS₂ in the previous reaction with I (R = Me, R1 = H) gave the pyrimido[4,5-d][1,3]thiazine II in good yield. The reaction of I (R = Me, Ph; R1 = CS₂Me) and R₂NH (R₂ = H, NH₂, Me, PhCH₂, cyclohexyl, morpholino, HOCH₂CH₂, (EtO)₂CHCH₂), yielded thiocarbamoyluracils I [R = Me, Ph, R1 = C(S)NR₂] in 31-91% yields. I [R = Me, R1 = C(S)SMe] and HCONH₂ reacted to yield III. Also prepared were pyrimido[4,5-d]pyrimidines IV (R₂ = H, Me; X = S) and IV (R₂ = PhCH₂, X = O) from the reaction of I [R = Me, R1 = C(S)NR₂, R₂ = H, Me, PhCH₂] with Ac₂O.

L6 ANSWER 12 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1979:439764 CAPLUS

DOCUMENT NUMBER: 91:39764

ORIGINAL REFERENCE NO.: 91:6497a,6500a

TITLE: Syntheses of nucleoside analogs using glycosyl isothiocyanate

AUTHOR(S): Ogura, Haruo; Takahashi, Hiroshi

CORPORATE SOURCE: Sch. Pharm. Sci., Kitasato Univ., Tokyo, Japan

SOURCE: Tennen Yuki Kagobutsu Toronkai Koen Yoshishu, 21st (1978), 221-8. Hokkaido Daigaku Nogakubu: Sapporo, Japan.

CODEN: 39NQAF

DOCUMENT TYPE: Conference

LANGUAGE: Japanese

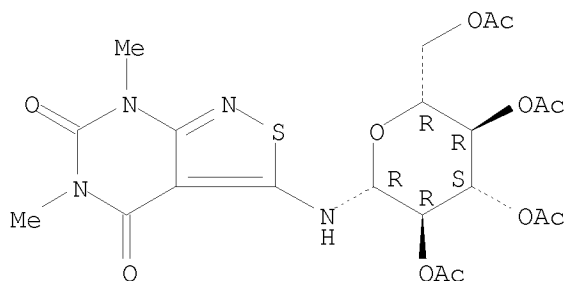
IT 58911-57-2P 62374-42-9P 62374-43-0P

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 58911-57-2 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[(2,3,4,6-tetra-O-acetyl- β -D-glucopyranosyl)amino]- (9CI) (CA INDEX NAME)

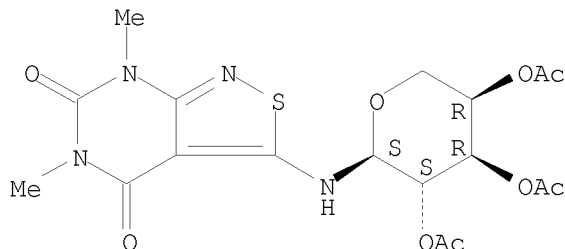
Absolute stereochemistry.



RN 62374-42-9 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[(2,3,4-tri-O-acetyl- α -D-arabinopyranosyl)amino]- (9CI) (CA INDEX NAME)

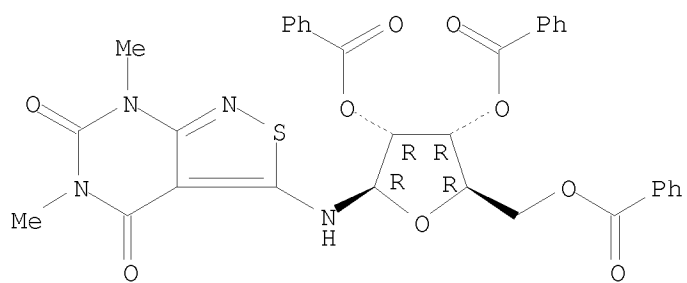
Absolute stereochemistry.



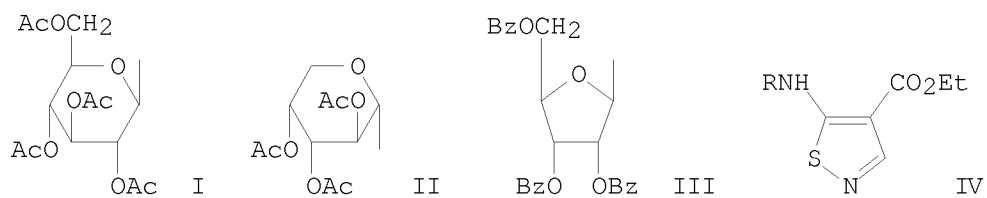
RN 62374-43-0 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[(2,3,5-tri-O-benzoyl- β -D-ribofuranosyl)amino]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



GI



AB Various nucleoside analogs containing isothiazole, isothiazolopyrimidine, fused imidazole, pyrimidothiadiazine, pyrazolopyrimidine, triazole, or triazine moieties were prepared by using RNCS (R = I, II, or III). E.g., reaction of RNCS and $\text{MeC}(\text{NH}_2):\text{CHCO}_2\text{Et}$ gave (glycosylamino)isothiazoles IV and $\text{MeC}(\text{NH}_2):\text{C}(\text{SCNHR})\text{CO}_2\text{Et}$ (V). V readily cyclized to IV.

L6 ANSWER 13 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1979:405191 CAPLUS

DOCUMENT NUMBER: 91:5191

ORIGINAL REFERENCE NO.: 91:975a,978a

TITLE: Enamino dithiocarboxylates. II. Methyl
6-aminouracil-5-dithiocarboxylates. 2. Synthesis and
reactions of 3-methylthioisothiazolo[3,4-d]pyrimidine-
4,6(5H,7H)-diones

AUTHOR(S): Okuda, Hiroto; Tominaga, Yoshinori; Matsuda, Yoshiro;
Kobayashi, Goro

CORPORATE SOURCE: Fac. Pharm. Sci., Nagasaki Univ., Nagasaki, 852, Japan

SOURCE: Heterocycles (1979), 12(4), 485-8

CODEN: HTCYAM; ISSN: 0385-5414

DOCUMENT TYPE: Journal

LANGUAGE: English

OTHER SOURCE(S): CASREACT 91:5191

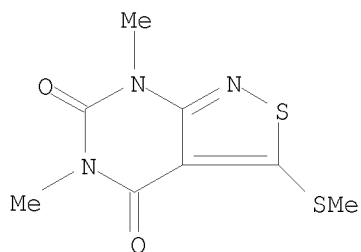
IT 70424-98-5P 70424-99-6P

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT
(Reactant or reagent)

(preparation and nucleophilic substitutions of)

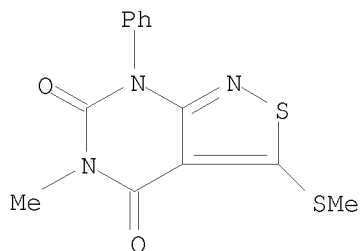
RN 70424-98-5 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-(methylthio)-
(CA INDEX NAME)



RN 70424-99-6 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5-methyl-3-(methylthio)-7-
phenyl- (CA INDEX NAME)



IT 52903-33-0P 61851-90-9P 70425-00-2P

70425-01-3P 70425-02-4P 70425-03-5P

70425-04-6P 70425-05-7P 70425-06-8P

70425-07-9P 70425-10-4P 70425-11-5P

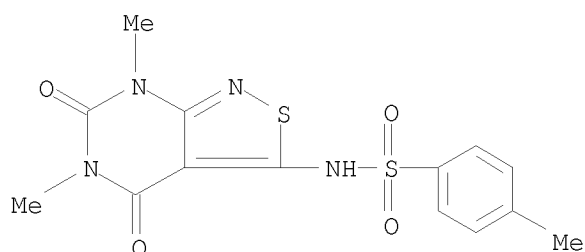
70425-12-6P 70425-13-7P

10/141,986

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

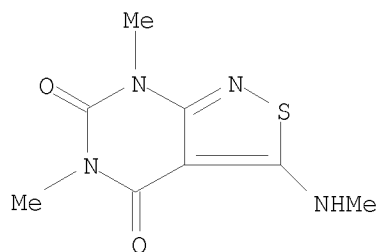
RN 52903-33-0 CAPLUS

CN Benzenesulfonamide, 4-methyl-N-(4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)



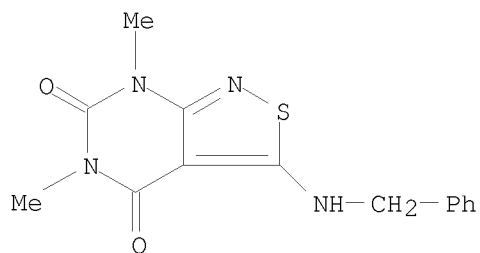
RN 61851-90-9 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-(methylamino)- (CA INDEX NAME)



RN 70425-00-2 CAPLUS

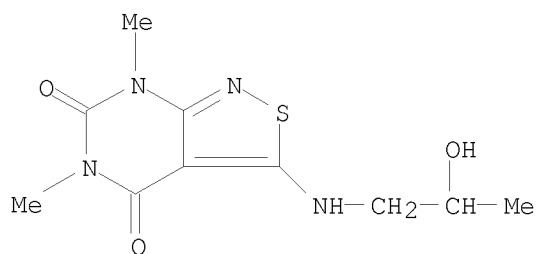
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[(phenylmethyl)amino]- (CA INDEX NAME)



RN 70425-01-3 CAPLUS

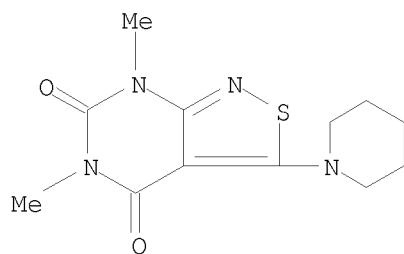
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-[(2-hydroxypropyl)amino]-5,7-dimethyl- (CA INDEX NAME)

10/141,986



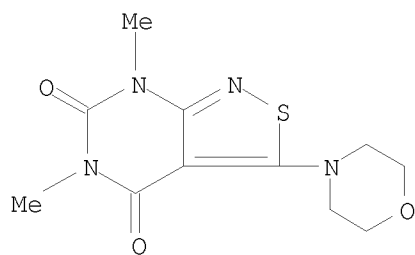
RN 70425-02-4 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-(1-piperidinyl)- (CA INDEX NAME)



RN 70425-03-5 CAPLUS

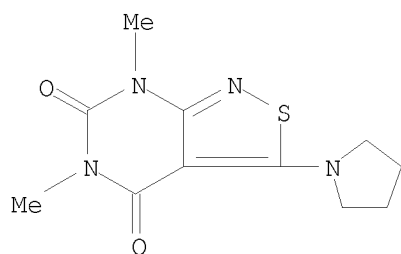
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-(4-morpholinyl)- (CA INDEX NAME)



RN 70425-04-6 CAPLUS

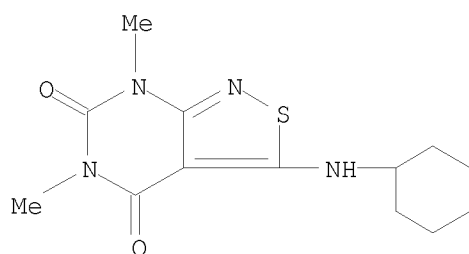
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-(1-pyrrolidinyl)- (CA INDEX NAME)

10/141,986



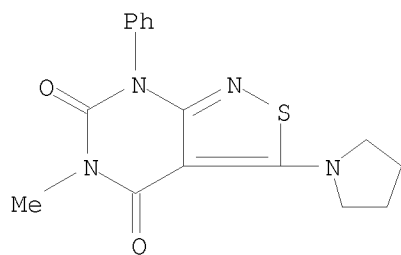
RN 70425-05-7 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(cyclohexylamino)-5,7-dimethyl- (CA INDEX NAME)



RN 70425-06-8 CAPLUS

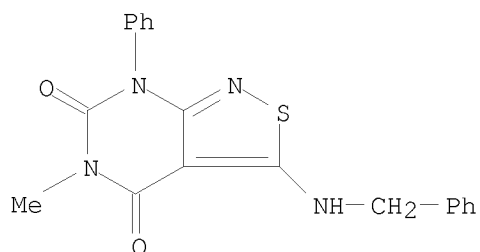
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5-methyl-7-phenyl-3-(1-pyrrolidinyl)- (CA INDEX NAME)



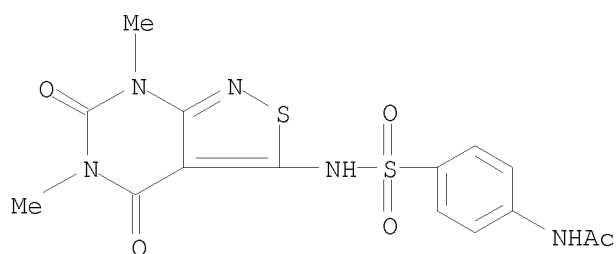
RN 70425-07-9 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5-methyl-7-phenyl-3-[(phenylmethyl)amino]- (CA INDEX NAME)

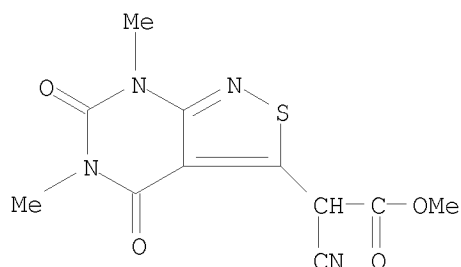
10/141,986



RN 70425-10-4 CAPLUS
CN Acetamide, N-[4-[[4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl]amino]sulfonyl]phenyl]- (CA INDEX NAME)

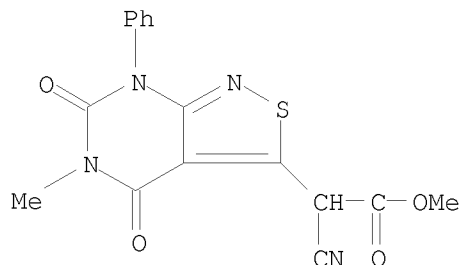


RN 70425-11-5 CAPLUS
CN Isothiazolo[3,4-d]pyrimidine-3-acetic acid, α -cyano-4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxo-, methyl ester (CA INDEX NAME)



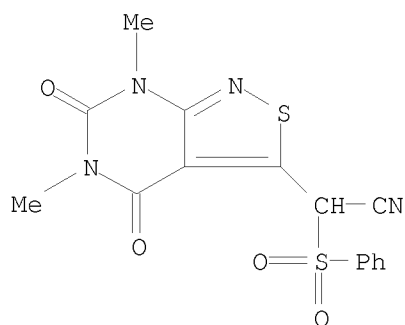
RN 70425-12-6 CAPLUS
CN Isothiazolo[3,4-d]pyrimidine-3-acetic acid, α -cyano-4,5,6,7-tetrahydro-5-methyl-4,6-dioxo-7-phenyl-, methyl ester (CA INDEX NAME)

10/141,986

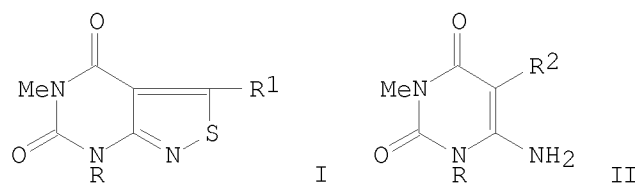


RN 70425-13-7 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-3-acetonitrile, 4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxo- α -(phenylsulfonyl)- (CA INDEX NAME)



GI



AB Isothiazolopyrimidinediones I (R = Me, Ph; R1 = SMe) were obtained by treating uracils II (R2 = H) with CS₂ and Me₂SO₄ and cyclizing II (R2 = CS₂Me) with iodine. I (R1 = SMe) underwent nucleophilic substitution to give I [R1 = amino, CH(CN)CO₂Me, CH(CN)SO₂Ph].

L6 ANSWER 14 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1978:580279 CAPLUS

DOCUMENT NUMBER: 89:180279

ORIGINAL REFERENCE NO.: 89:28019a,28022a

TITLE: Syntheses of modified nucleoside analogs with isothiocyanates

AUTHOR(S): Ogura, Haruo; Takahashi, Hiroshi

CORPORATE SOURCE: Sch. Pharm. Sci., Kitasato Univ., Tokyo, Japan

SOURCE: Symp. Heterocycl., [Pap.] (1977), 135-40. Editor(s):

Kametani, Tetsuji. Sendai Inst. Heterocycl. Chem.:

Sendai, Japan.

CODEN: 38WUAV

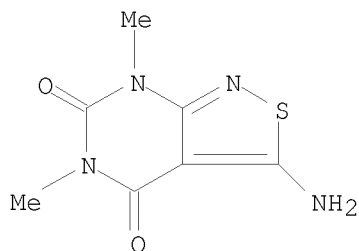
DOCUMENT TYPE: Conference

LANGUAGE: English

IT 52903-30-7DP, glycosyl derivs.

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 52903-30-7 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-5,7-dimethyl- (CA
INDEX NAME)

AB Syntheses of nucleoside analogs via reactions of glycosyl isothiocyanate and glyconyl isothiocyanate with amino acids, enamines, and diamines are outlined.

L6 ANSWER 15 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1977:140380 CAPLUS

DOCUMENT NUMBER: 86:140380

ORIGINAL REFERENCE NO.: 86:22061a,22064a

TITLE: Reaction of enamine with D-glycosyl and D-gluconyl isothiocyanate

AUTHOR(S): Ogura, Haruo; Takahashi, Hiroshi; Takeda, Kazuyoshi; Nimura, Noriyuki

CORPORATE SOURCE: Sch. Pharm. Sci., Kitasato Univ., Tokyo, Japan

SOURCE: Nucleic Acids Research, Special Publication (1976), 2(Symp. Nucleic Acids Chem., 4th, 1976), 7-10

CODEN: NARPD6; ISSN: 0309-1872

DOCUMENT TYPE: Journal

LANGUAGE: English

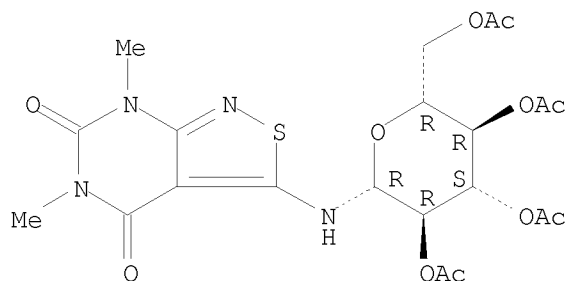
IT 58911-57-2P 62374-42-9P 62374-43-0P

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 58911-57-2 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[(2,3,4,6-tetra-O-acetyl- β -D-glucopyranosyl)amino]- (9CI) (CA INDEX NAME)

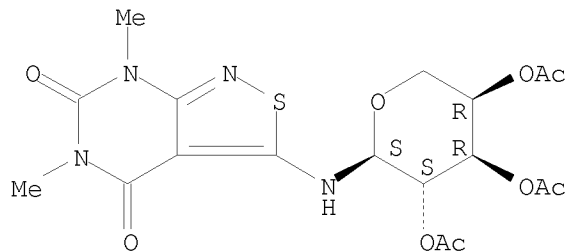
Absolute stereochemistry.



RN 62374-42-9 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[(2,3,4-tri-O-acetyl- α -D-arabinopyranosyl)amino]- (9CI) (CA INDEX NAME)

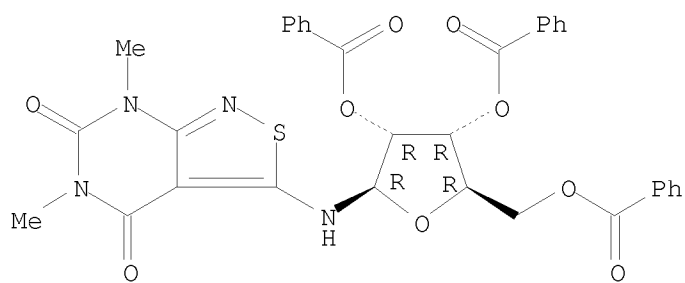
Absolute stereochemistry.



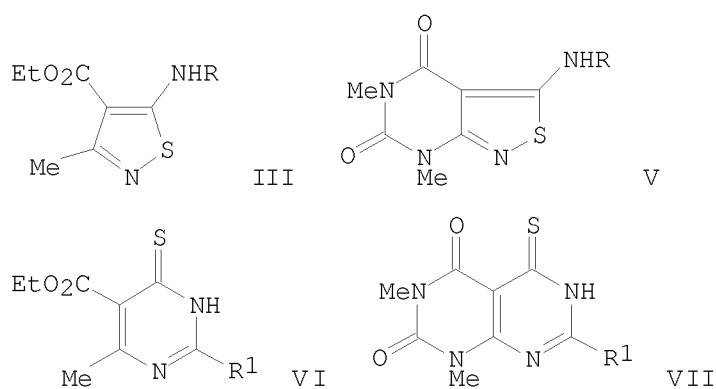
RN 62374-43-0 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[(2,3,5-tri-O-benzoyl- β -D-ribofuranosyl)amino]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



GI



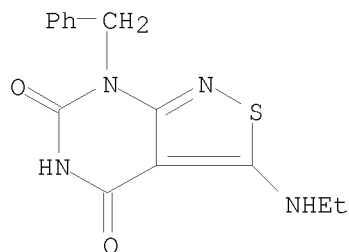
AB Treatment of RNCS (I; R = tetra-O-acetyl- β -D-glucopyranosyl, tri-O-acetyl- α -D-arabinopyranosyl, tri-O-benzoyl- β -D-ribofuranosyl) with $\text{H}_2\text{NCMe:CHCO}_2\text{Et}$ (II) in THF at room temperature gave isothazoles III and $\text{H}_2\text{NCMe:C(CO}_2\text{Et)C(S)NHR}$, and I cyclized with 6-amino-1,3-dimethyluracil (IV) to give thiazolopyrimidines V. Treatment of penta-O-acetyl-D-gluconyl isothiocyanate with II and IV gave VI and VII (R_1 = penta-O-acetyl-D-gluconyl).

L6 ANSWER 16 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

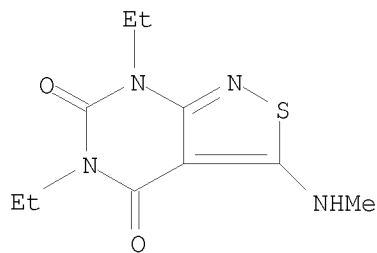
ACCESSION NUMBER: 1977:89864 CAPLUS
 DOCUMENT NUMBER: 86:89864
 ORIGINAL REFERENCE NO.: 86:14197a,14200a
 TITLE: Isothiazolo[3,4-d]pyrimidines
 INVENTOR(S): Furukawa, Yoshiyasu; Shima, Shunsuke
 PATENT ASSIGNEE(S): Takeda Chemical Industries, Ltd., Japan
 SOURCE: Jpn. Kokai Tokkyo Koho, 11 pp.
 CODEN: JKXXAF
 DOCUMENT TYPE: Patent
 LANGUAGE: Japanese
 FAMILY ACC. NUM. COUNT: 1
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
JP 51091294	A	19760810	JP 1975-16658	19750207

PRIORITY APPLN. INFO.: JP 1975-16658 A 19750207
 IT 60663-75-4P 60663-76-5P 60663-78-7P
 60663-79-8P 60663-80-1P 60663-83-4P
 60663-84-5P 61851-90-9P
 RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT
 (Reactant or reagent)
 (preparation and alkylation of)
 RN 60663-75-4 CAPLUS
 CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(ethylamino)-7-(phenylmethyl)- (CA INDEX NAME)



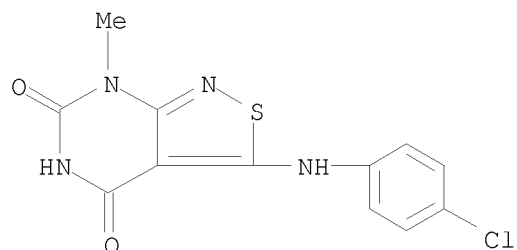
RN 60663-76-5 CAPLUS
 CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-diethyl-3-(methylamino)-
 (CA INDEX NAME)



RN 60663-78-7 CAPLUS

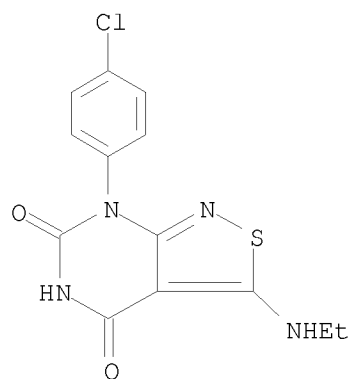
10/141,986

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-[(4-chlorophenyl)amino]-7-methyl- (CA INDEX NAME)



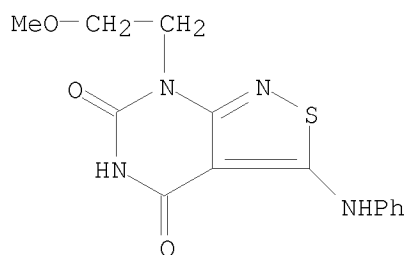
RN 60663-79-8 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 7-(4-chlorophenyl)-3-(ethylamino)- (CA INDEX NAME)



RN 60663-80-1 CAPLUS

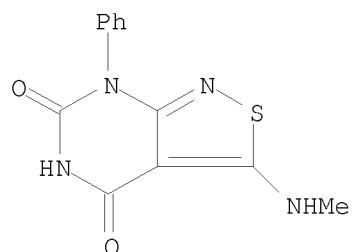
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 7-(2-methoxyethyl)-3-(phenylamino)- (CA INDEX NAME)



RN 60663-83-4 CAPLUS

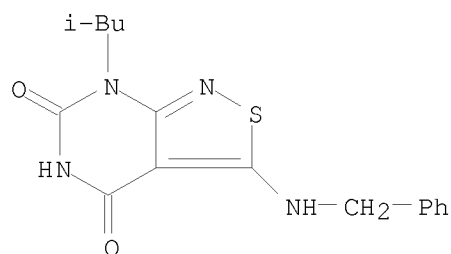
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10/141,986



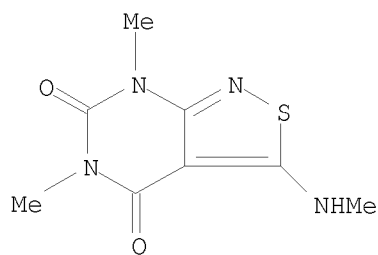
RN 60663-84-5 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 7-(2-methylpropyl)-3-[(phenylmethyl)amino]- (CA INDEX NAME)



RN 61851-90-9 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-(methyldiamino)- (CA INDEX NAME)



IT 56540-86-4P 56540-98-8P 56541-01-6P

56541-02-7P 56541-03-8P 56541-04-9P

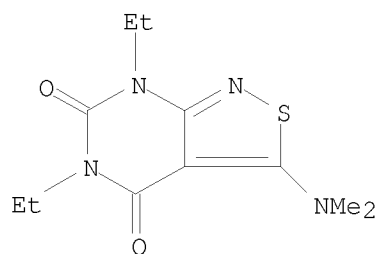
56541-05-0P 60663-90-3P 61851-88-5P

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 56540-86-4 CAPLUS

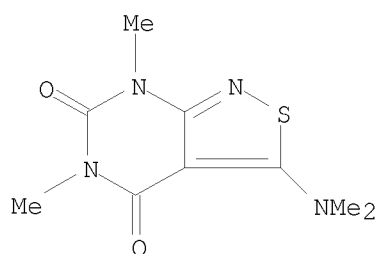
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-5,7-diethyl- (CA INDEX NAME)

10/141,986



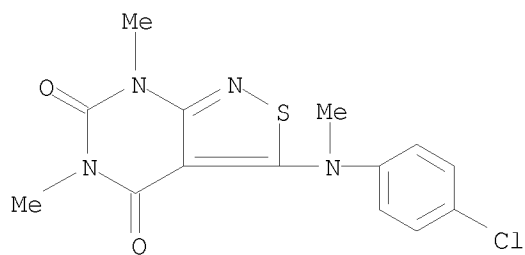
RN 56540-98-8 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-5,7-dimethyl- (CA INDEX NAME)



RN 56541-01-6 CAPLUS

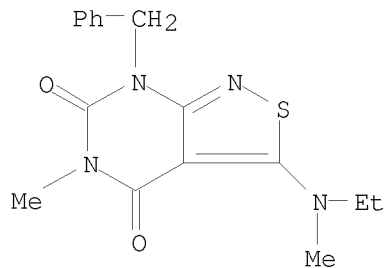
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-[(4-chlorophenyl)methylamino]-5,7-dimethyl- (CA INDEX NAME)



RN 56541-02-7 CAPLUS

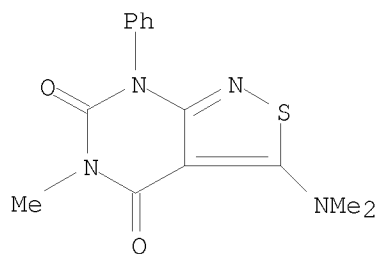
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(ethylmethylamino)-5-methyl-7-(phenylmethyl)- (CA INDEX NAME)

10/141,986



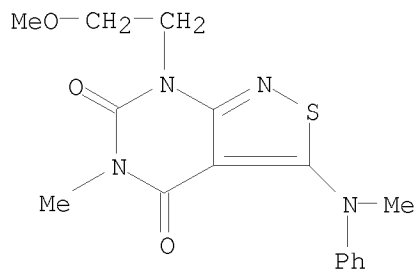
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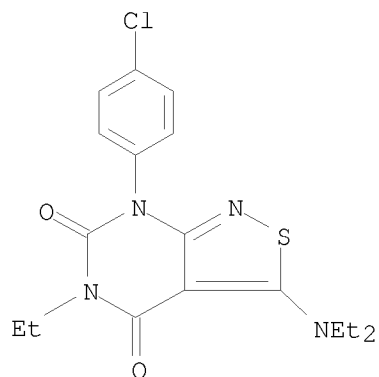
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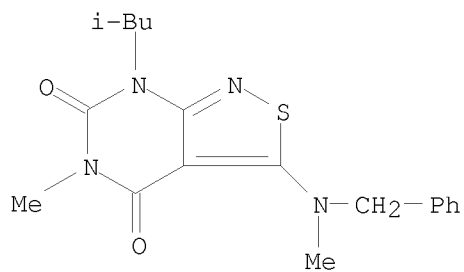
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 7-(4-chlorophenyl)-3-(diethylamino)-5-ethyl- (CA INDEX NAME)

10/141,986



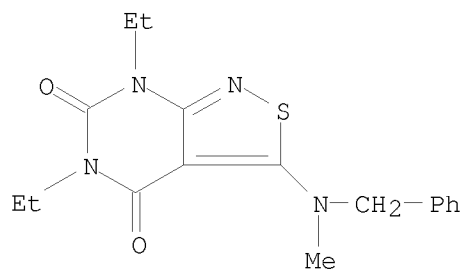
RN 60663-90-3 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5-methyl-3-[methyl(phenylmethyl)amino]-7-(2-methylpropyl)- (CA INDEX NAME)

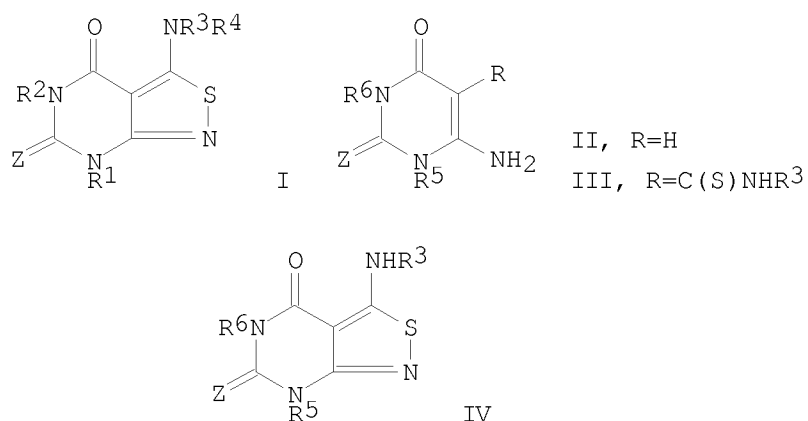


RN 61851-88-5 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,6H)-dione, 5,7-diethyl-3-[methyl(phenylmethyl)amino]- (9CI) (CA INDEX NAME)



GI



AB Isothiazolo[3,4-d]pyrimidines I (R₁, R₃ = alkyl, aryl; R₂, R₄ = alkyl; Z = O, S) were prepared by reaction of II (R₅, R₆ = H, alkyl, aryl) with R₃NCS, cyclization of the resulting III, and alkylation of the resulting IV. I had adenosine 3',5'-cyclic phosphate phosphodiesterase-inhibiting activity and are useful as antiinflammatory agents and sedatives (no data). Thus, 7.32 g II (R₅ = R₆ = Et, Z = O) in pyridine was refluxed with 8 ml MeNCS 24 h to give 6.74 g III (R₃ = Me, R₅ = R₆ = Et, Z = O) (V). Stirring 5.8 g V in AcOEt with 3.4 ml Br 1 h at room temperature gave 5 g IV (R₃ = Me, R₅ = R₆ = Et, Z = O) (VI). Stirring a mixture of 5 g VI, 5 g K₂CO₃, and 5 ml MeI in DMF 16 h at room temperature gave 4 g I (R₁ = R₂ = Et, R₃ = R₄ = Me, Z = O). I also prepared were (R₁, R₂, R₃, R₄, Z given): Me, Me, Me, Me, O; Ph, Me, Me, Me, O; p-ClC₆H₄, Et, Et, Et, O; Me, Me, p-ClC₆H₄, Me, O; PhCH₂, Me, Et, Me, O; MeOCH₂CH₂, Me, Ph, Me, O; Et, Et, Me, Me, S; iso-Bu, Me, PhCH₂, Me, O; and Et, Et, PhCH₂, Me, O.

L6 ANSWER 17 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1976:560012 CAPLUS

DOCUMENT NUMBER: 85:160012

ORIGINAL REFERENCE NO.: 85:25613a,25616a

TITLE: Fused pyrimidines. II. Synthesis and oxidation of 3-aminoisothiazolo[3,4-d]pyrimidines

AUTHOR(S): Furukawa, Yoshiyasu; Shima, Shunsuke

CORPORATE SOURCE: Cent. Res. Div., Takeda Chem. Ind., Ltd., Osaka, Japan

SOURCE: Chemical & Pharmaceutical Bulletin (1976), 24(5), 979-86

CODEN: CPBTAL; ISSN: 0009-2363

DOCUMENT TYPE: Journal

LANGUAGE: English

OTHER SOURCE(S): CASREACT 85:160012

IT 60663-75-4P 60663-76-5P 60663-78-7P

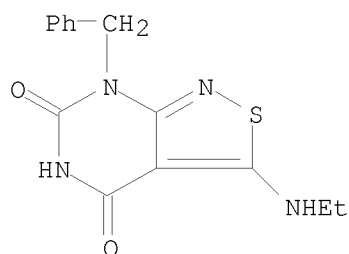
60663-79-8P 60663-83-4P 60663-84-5P

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)

(preparation and alkylation of)

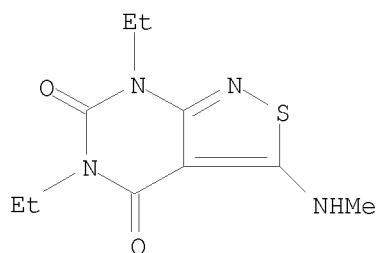
RN 60663-75-4 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(ethylamino)-7-(phenylmethyl)- (CA INDEX NAME)



RN 60663-76-5 CAPLUS

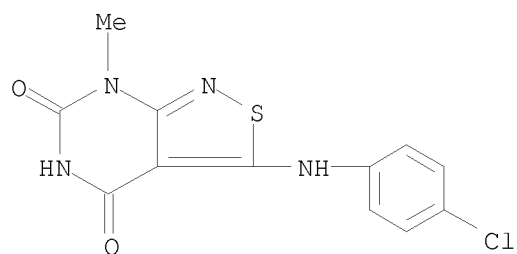
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-diethyl-3-(methylamino)- (CA INDEX NAME)



RN 60663-78-7 CAPLUS

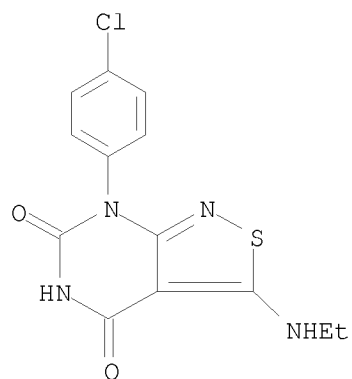
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-[(4-chlorophenyl)amino]-7-methyl- (CA INDEX NAME)

10/141,986



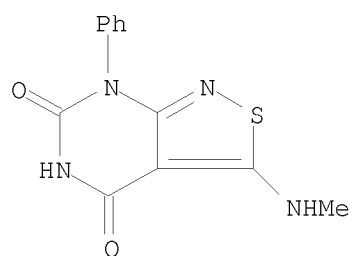
RN 60663-79-8 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 7-(4-chlorophenyl)-3-(ethylamino)- (CA INDEX NAME)



RN 60663-83-4 CAPLUS

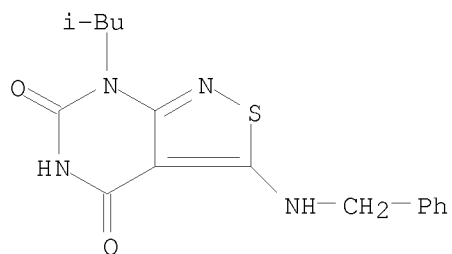
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(methylamino)-7-phenyl- (CA INDEX NAME)



RN 60663-84-5 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 7-(2-methylpropyl)-3-[(phenylmethyl)amino]- (CA INDEX NAME)

10/141,986

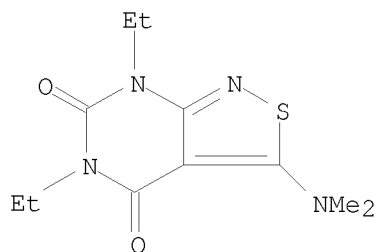


IT 56540-86-4P 56541-01-6P 56541-02-7P
56541-03-8P 56541-04-9P 56541-05-0P
60663-77-6P 60663-80-1P 60663-81-2P
60663-82-3P 60663-85-6P 60663-86-7P
60663-87-8P 60663-88-9P 60663-89-0P
60663-90-3P 60700-23-4P

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

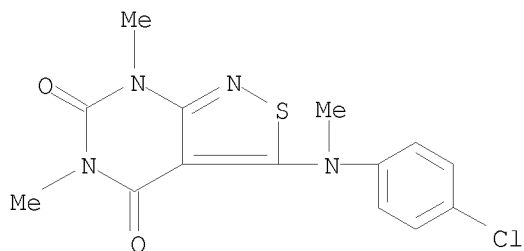
RN 56540-86-4 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-5,7-diethyl- (CA INDEX NAME)



RN 56541-01-6 CAPLUS

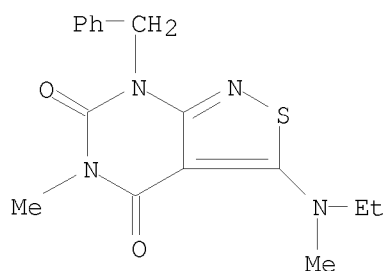
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-[(4-chlorophenyl)methylamino]-5,7-dimethyl- (CA INDEX NAME)



RN 56541-02-7 CAPLUS

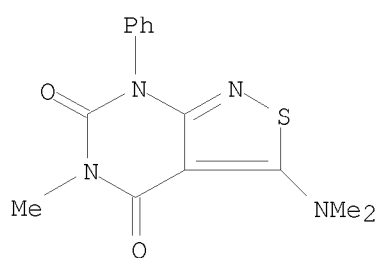
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(ethylmethylamino)-5-methyl-7-(phenylmethyl)- (CA INDEX NAME)

10/141,986



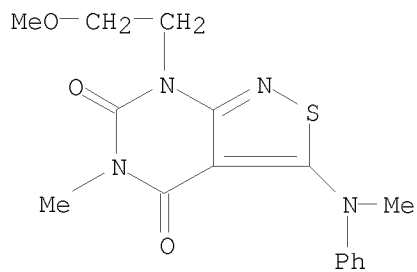
RN 56541-03-8 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-5-methyl-7-phenyl- (CA INDEX NAME)



RN 56541-04-9 CAPLUS

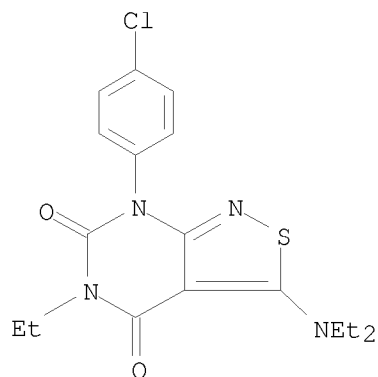
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 7-(2-methoxyethyl)-5-methyl-3-(methylphenylamino)- (CA INDEX NAME)



RN 56541-05-0 CAPLUS

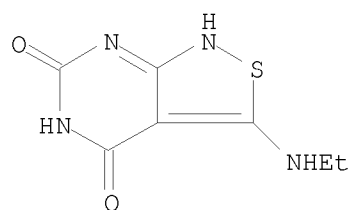
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10/141,986



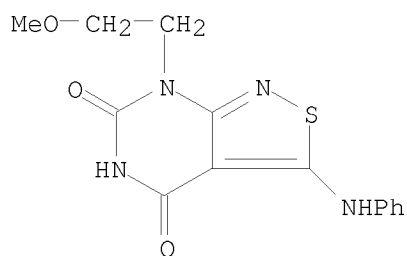
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CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(ethylamino)- (9CI) (CA INDEX NAME)



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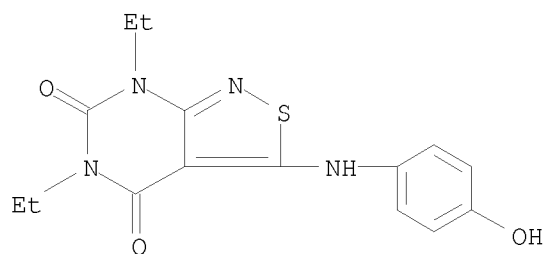
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 7-(2-methoxyethyl)-3-(phenylamino)- (CA INDEX NAME)



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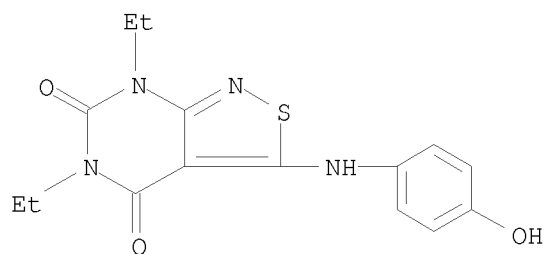
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-diethyl-3-[(4-hydroxyphenyl)amino]- (CA INDEX NAME)

10/141,986



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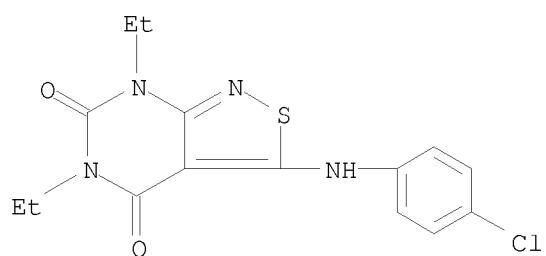
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-diethyl-3-[(4-hydroxyphenyl)amino]-, dihydrobromide (9CI) (CA INDEX NAME)



● 2 HBr

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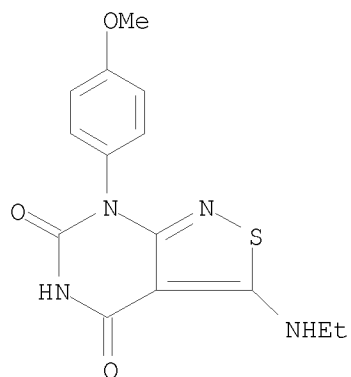
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RN 60663-86-7 CAPLUS

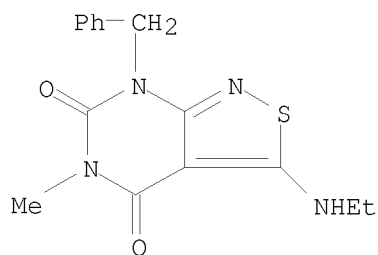
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(ethylamino)-7-(4-methoxyphenyl)- (CA INDEX NAME)

10/141,986



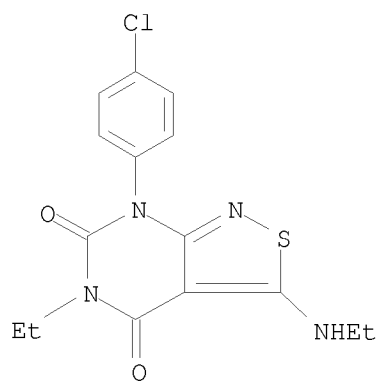
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CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(ethylamino)-5-methyl-7-(phenylmethyl)- (CA INDEX NAME)



RN 60663-88-9 CAPLUS

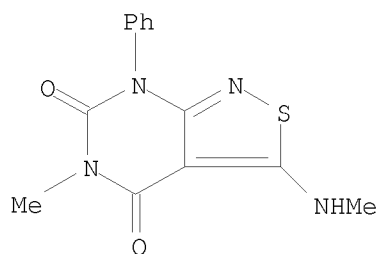
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RN 60663-89-0 CAPLUS

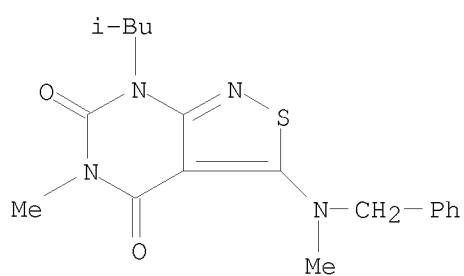
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5-methyl-3-(methylamino)-7-phenyl- (CA INDEX NAME)

10/141,986



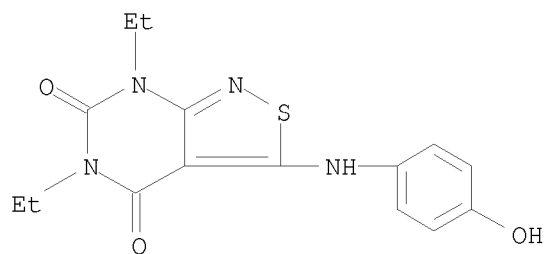
RN 60663-90-3 CAPLUS

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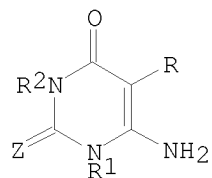
RN 60700-23-4 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-diethyl-3-[(4-hydroxyphenyl)amino]-, monohydrobromide (9CI) (CA INDEX NAME)

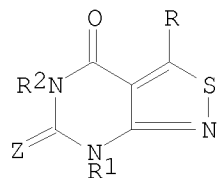
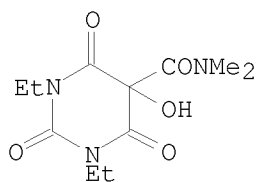


● HBr

GI



I, R=H, Z=O,S

II, R=C(S)NHR³, Z=O,SIII, R=NHR³IV, R=NR³R⁴

V

AB The 6-aminouracils I (R₁ = PhCH₂, Et, H, Me, p-ClC₆H₄, MeOCH₂CH₂, Ph, Me₂CHCH₂, p-MeOC₆H₄; R₂ = H, Et) reacted with SCNR₃ (R₃ = Et, Me, C₆H₄Cl-p, Ph, C₆H₄OH-p, CH₂Ph) to give the thiocarbamoyluracils II, which were oxidized with Br or H₂O₂ to give the isothiazolopyrimidinediones III, whose alkylation with R₄I (R₄ = Me, Et) gave the (disubstituted amino)isothiazolopyrimidines IV. Further oxidation of III or IV (R₁ = R₂ = Et, R₃ = R₄ = Me) with H₂O₂ gave the hydroxybarbituric acid V. Aminoisothiazolopyrimidines are potential cyclic nucleotide phosphodiesterase inhibitors.

L6 ANSWER 18 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1976:560011 CAPLUS

DOCUMENT NUMBER: 85:160011

ORIGINAL REFERENCE NO.: 85:25613a,25616a

TITLE: Fused pyrimidines. I. A one-step synthesis of
3-aminoisothiazolo[3,4-d]pyrimidines from
6-aminouracils and Vilsmeier reagents

AUTHOR(S): Furukawa, Yoshiyasu; Miyashita, Osamu; Shima, Shunsuke

CORPORATE SOURCE: Cent. Res. Div., Takeda Chem. Ind., Ltd., Osaka, Japan

SOURCE: Chemical & Pharmaceutical Bulletin (1976), 24(5),
970-8

CODEN: CPBTAL; ISSN: 0009-2363

DOCUMENT TYPE: Journal

LANGUAGE: English

OTHER SOURCE(S): CASREACT 85:160011

IT 56540-86-4P 56540-88-6P 56540-89-7P

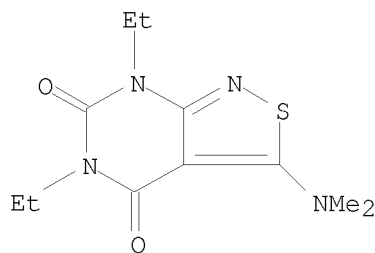
56540-91-1P 56540-92-2P 56540-98-8P

56540-99-9P 56541-00-5P 60663-76-5P

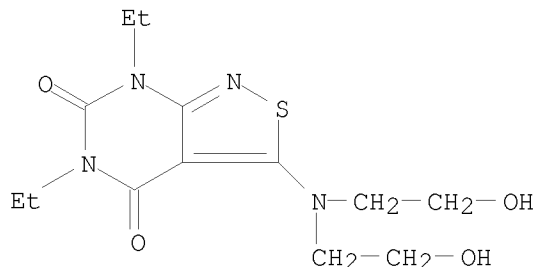
60664-03-1P 60664-09-7P

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 56540-86-4 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-5,7-
diethyl- (CA INDEX NAME)

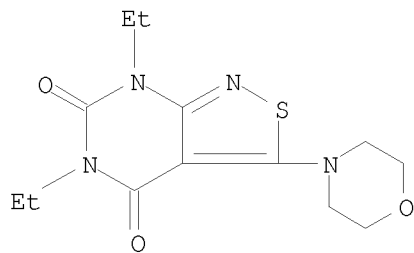
RN 56540-88-6 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-[bis(2-
hydroxyethyl)amino]-5,7-diethyl- (CA INDEX NAME)

RN 56540-89-7 CAPLUS

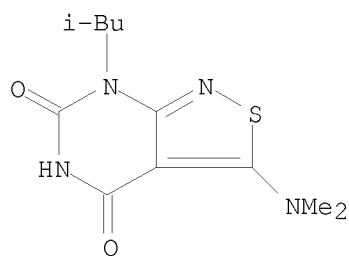
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-diethyl-3-(4-
morpholinyl)- (CA INDEX NAME)

10/141,986



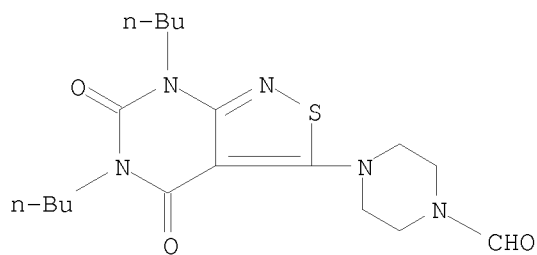
RN 56540-91-1 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-7-(2-methylpropyl)- (CA INDEX NAME)



RN 56540-92-2 CAPLUS

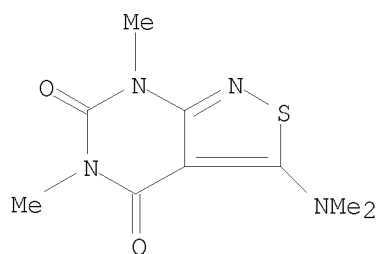
CN 1-Piperazinecarboxaldehyde, 4-(5,7-dibutyl-4,5,6,7-tetrahydro-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)



RN 56540-98-8 CAPLUS

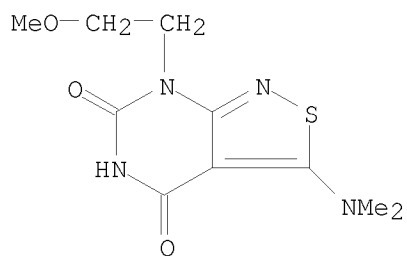
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-5,7-dimethyl- (CA INDEX NAME)

10/141,986



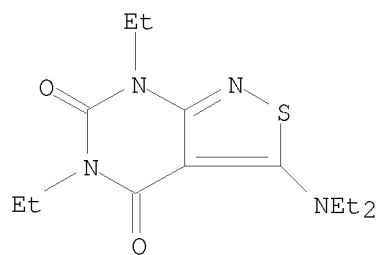
RN 56540-99-9 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-7-(2-methoxyethyl)- (CA INDEX NAME)



RN 56541-00-5 CAPLUS

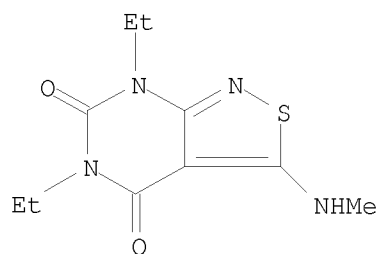
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(diethylamino)-5,7-diethyl- (CA INDEX NAME)



RN 60663-76-5 CAPLUS

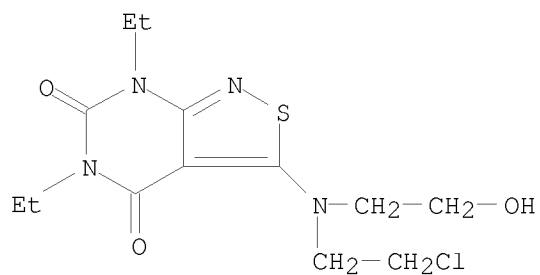
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-diethyl-3-(methylamino)- (CA INDEX NAME)

10/141,986



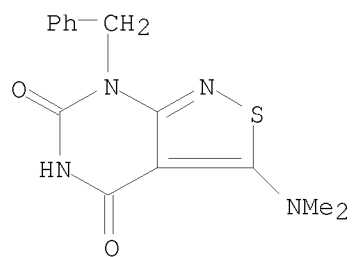
RN 60664-03-1 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-[(2-chloroethyl)(2-hydroxyethyl)amino]-5,7-diethyl- (CA INDEX NAME)

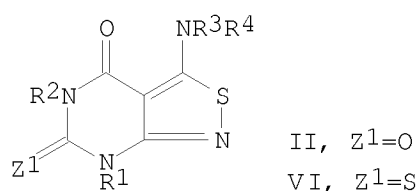
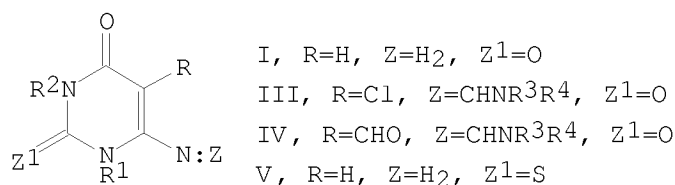


RN 60664-09-7 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-7-(phenylmethyl)- (CA INDEX NAME)



GI



AB Reaction of the aminouracil I (R₁ = R₂ = Et) with DMF-SOCl₂ gave the (dimethylamino)isothiazolopyrimidinedione II (R₃ = R₄ = Me) and the uracils III, IV, and II (R₃ = Me, R₄ = H) as minor products, whereas similar reactions of I (R₁ = R₂ = Et, Bu) or 6-amino-1-benzylcytoccine with OHCNR₃R₄ (R₃, R₄ = CH₂CH₂OCHO, Et, or NR₃R₄ = morpholino, 4-formyl-1-piperazinyl)-SOCl₂ gave the corresponding II (R₁ = Et, Bu, CH₂Ph; R₂-R₄ = same as above). However, the S analog V (R₁ = R₂ = Et) reacted with DMF-SOCl₂ to give mainly II (R₁ = R₂ = Et, R₃ = R₄ = Me) and very little its S analog VI (R₁-R₄ same as above). Aminoisothiazolopyrimidines are potential cyclic nucleotide phosphodiesterase inhibitors.

L6 ANSWER 19 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1976:150881 CAPLUS

DOCUMENT NUMBER: 84:150881

ORIGINAL REFERENCE NO.: 84:24535a,24538a

TITLE: Modified nucleoside syntheses

AUTHOR(S): Ogura, Haruo; Takahashi, Hiroshi; Takeda, Kazuyoshi;
 Sakaguchi, Masakazu; Nimura, Noriyuki; Sakai, Hitomi
 CORPORATE SOURCE: Sch. Pharm. Sci., Kitasato Univ., Tokyo, Japan
 SOURCE: Hukusokan Kagaku Toronkai Koen Yoshishu, 8th (1975),
 154-8. Pharm. Inst., Tohoku Univ.: Sendai, Japan.
 CODEN: 32KOAD

DOCUMENT TYPE: Conference

LANGUAGE: Japanese

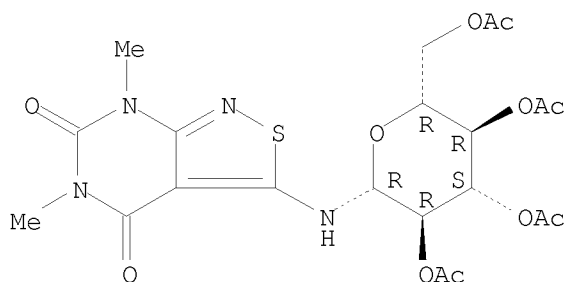
IT 58911-57-2P

RL: SPN (Synthetic preparation); PREP (Preparation)
 (preparation of)

RN 58911-57-2 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[(2,3,4,6-
 tetra-O-acetyl- β -D-glucopyranosyl)amino]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



GI For diagram(s), see printed CA Issue.

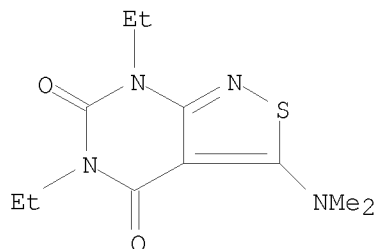
AB The isothiocyanates I and II were treated with o-C₆H₄(NH₂)₂ or 5,6-diamino-1,3-dimethyluracil to give the modified nucleosides III and IV (X = CH:CHCH:CH, NMeCONMeCO, resp.). IV reacted with MeI with elimination of MeSH and gave the corresponding imidazoles V. R₂COCH:C(NH₂)NMeR₃ (R₂ = EtO, R₃ = Me; R₂R₃ = NMeCONMe) reacted with I and II to give the corresponding pyrimidines (VI, VII, resp.).

L6 ANSWER 20 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1975:497362 CAPLUS
 DOCUMENT NUMBER: 83:97362
 ORIGINAL REFERENCE NO.: 83:15309a,15312a
 TITLE: 3-Disubstituted aminoisothiazolo[3,4-d]pyrimidines
 INVENTOR(S): Furukawa, Yoshiyasu; Miyashita, Osamu
 PATENT ASSIGNEE(S): Takeda Chemical Industries, Ltd., Japan
 SOURCE: Ger. Offen., 24 pp.
 CODEN: GWXXBX
 DOCUMENT TYPE: Patent
 LANGUAGE: German
 FAMILY ACC. NUM. COUNT: 1
 PATENT INFORMATION:

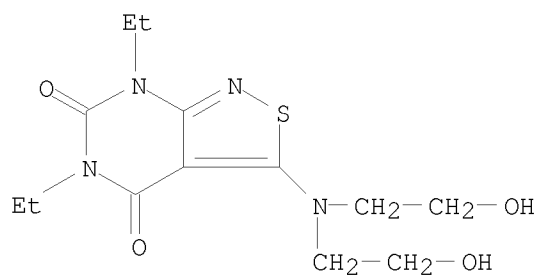
PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 2453212	A1	19750515	DE 1974-2453212	19741109
JP 50082092	A	19750703	JP 1973-127050	19731112
JP 58026356	B	19830602		
FR 2250532	A1	19750606	FR 1974-37112	19741108
FR 2250532	B1	19790504		
US 3959280	A	19760525	US 1974-522863	19741111
GB 1436297	A	19760519	GB 1974-48874	19741112
US 4052391	A	19771004	US 1976-663227	19760303
PRIORITY APPLN. INFO.:			JP 1973-127050	A 19731112
			US 1974-522863	A3 19741111

IT 56540-86-4P 56540-88-6P 56540-89-7P
 56540-90-0P 56540-91-1P 56540-92-2P
 56540-93-3P 56540-98-8P 56540-99-9P
 56541-00-5P 56541-01-6P 56541-02-7P
 56541-03-8P 56541-04-9P 56541-05-0P
 RL: SPN (Synthetic preparation); PREP (Preparation)
 (preparation of)
 RN 56540-86-4 CAPLUS
 CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-5,7-diethyl- (CA INDEX NAME)



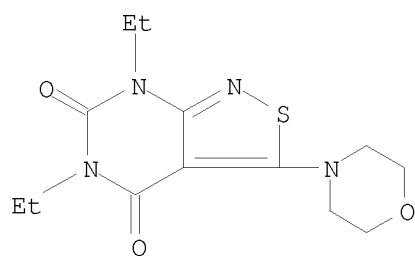
RN 56540-88-6 CAPLUS
 CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-[bis(2-hydroxyethyl)amino]-5,7-diethyl- (CA INDEX NAME)

10/141,986



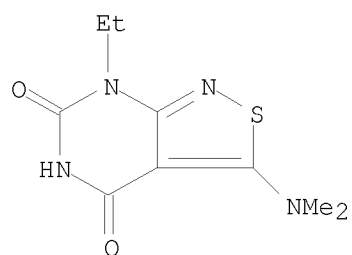
RN 56540-89-7 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-diethyl-3-(4-morpholinyl)- (CA INDEX NAME)



RN 56540-90-0 CAPLUS

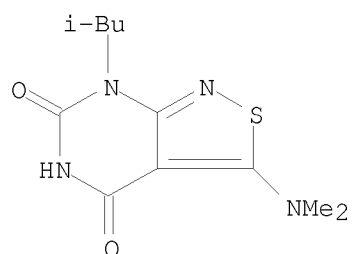
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-7-ethyl- (CA INDEX NAME)



RN 56540-91-1 CAPLUS

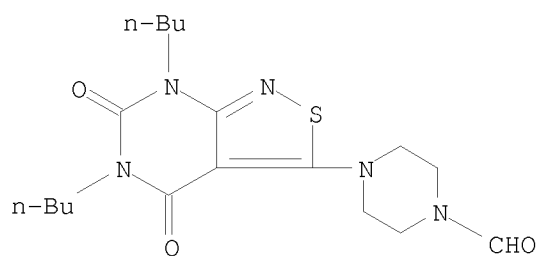
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-7-(2-methylpropyl)- (CA INDEX NAME)

10/141,986



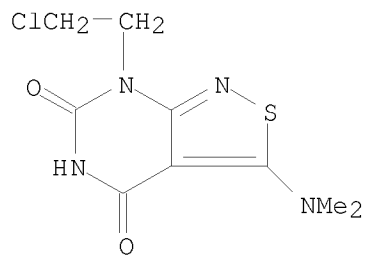
RN 56540-92-2 CAPLUS

CN 1-Piperazinecarboxaldehyde, 4-(5,7-dibutyl-4,5,6,7-tetrahydro-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)



RN 56540-93-3 CAPLUS

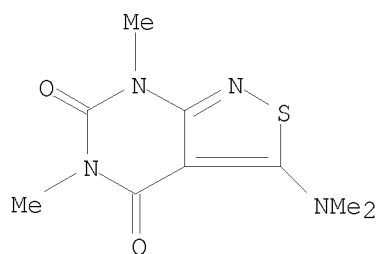
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 7-(2-chloroethyl)-3-(dimethylamino)- (CA INDEX NAME)



RN 56540-98-8 CAPLUS

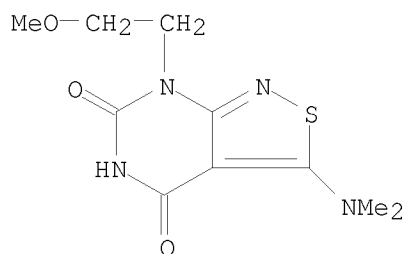
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-5,7-dimethyl- (CA INDEX NAME)

10/141,986



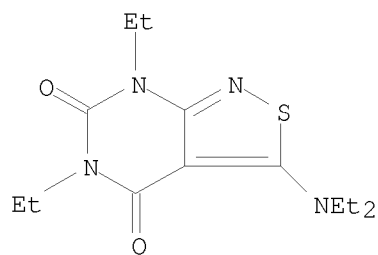
RN 56540-99-9 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-7-(2-methoxyethyl)- (CA INDEX NAME)



RN 56541-00-5 CAPLUS

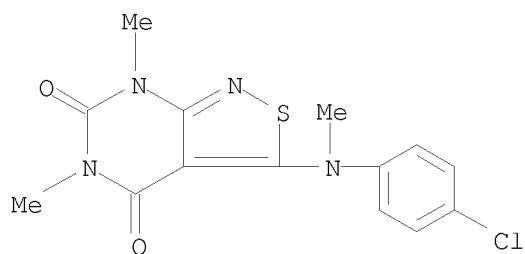
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(diethylamino)-5,7-diethyl- (CA INDEX NAME)



RN 56541-01-6 CAPLUS

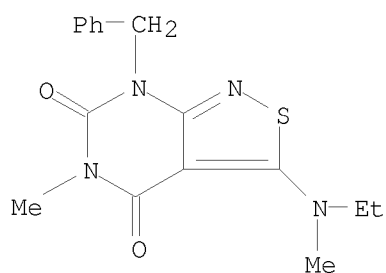
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-[(4-chlorophenyl)methylamino]-5,7-dimethyl- (CA INDEX NAME)

10/141,986



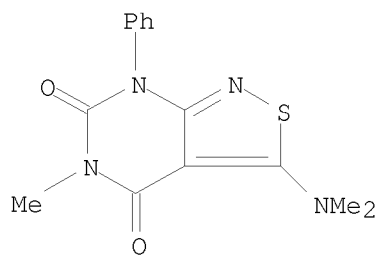
RN 56541-02-7 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(ethylmethylanino)-5-methyl-7-(phenylmethyl)- (CA INDEX NAME)



RN 56541-03-8 CAPLUS

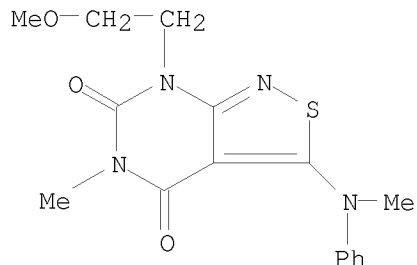
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-(dimethylamino)-5-methyl-7-phenyl- (CA INDEX NAME)



RN 56541-04-9 CAPLUS

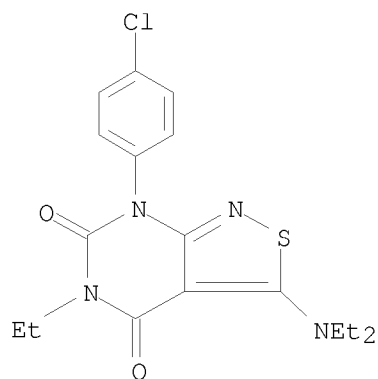
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 7-(2-methoxyethyl)-5-methyl-3-(methylphenylanino)- (CA INDEX NAME)

10/141,986



RN 56541-05-0 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 7-(4-chlorophenyl)-3-(diethylamino)-5-ethyl- (CA INDEX NAME)



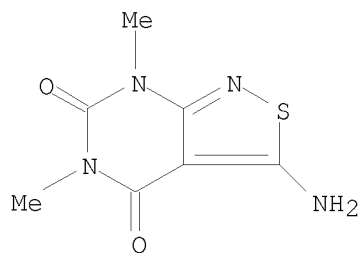
GI For diagram(s), see printed CA Issue.

AB Isothiazolopyrimidines (I, R1 = Me, HOCH2CH2, Et, R2 = Me, HOCH2CH2, Et, p-ClC6H4, Ph, R3 = Et, Me2CHCH2, Bu, ClCH2CH2, Me, MeOCH2CH2, PhCH2, Ph, p-ClC6H4, R4 = Et, H, Bu, Me, R1R2N = morpholino, 4-formylpiperazinyl), useful as sedatives and inflammation inhibitors, were prepared by cyclization of an aminouracil (II) with R1R1NCHO. I were also useful as adenosine 3',5'-cyclicphosphate phosphodiesterase inhibitors.

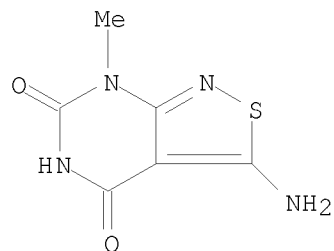
L6 ANSWER 21 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN
 ACCESSION NUMBER: 1975:412166 CAPLUS
 DOCUMENT NUMBER: 83:12166
 ORIGINAL REFERENCE NO.: 83:2035a,2038a
 TITLE: Isothiazolopyrimidindione dyes
 INVENTOR(S): Eilingsfeld, Heinz; Hanse, Guenter
 PATENT ASSIGNEE(S): BASF A.-G.
 SOURCE: Ger. Offen., 30 pp.
 CODEN: GWXXBX
 DOCUMENT TYPE: Patent
 LANGUAGE: German
 FAMILY ACC. NUM. COUNT: 1
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 2336978	A1	19750206	DE 1973-2336978	19730720

PRIORITY APPLN. INFO.: DE 1973-2336978 A 19730720
 IT 52903-30-7
 RL: USES (Uses)
 (coupling of diazotized, with (hydroxyethyl)ethylaniline)
 RN 52903-30-7 CAPLUS
 CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-5,7-dimethyl- (CA INDEX NAME)



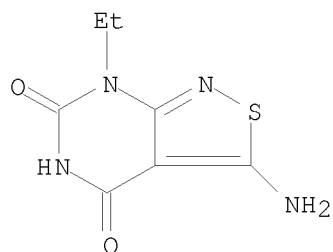
IT 52903-28-3 52903-29-4 52903-32-9
 RL: USES (Uses)
 (coupling of diazotized, with [(cyanoethyl)ethylamino]benzene)
 RN 52903-28-3 CAPLUS
 CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-7-methyl- (CA INDEX NAME)



RN 52903-29-4 CAPLUS

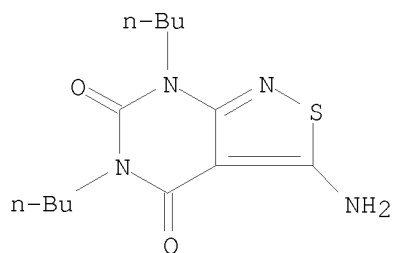
10/141,986

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-7-ethyl- (CA INDEX NAME)



RN 52903-32-9 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-5,7-dibutyl- (CA INDEX NAME)



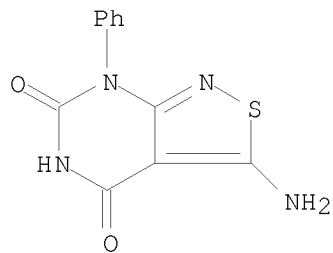
IT 52956-48-6

RL: USES (Uses)

(coupling with diazotized, with (diethylamino)acetanilide)

RN 52956-48-6 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-7-phenyl- (CA INDEX NAME)



IT 55345-46-5P

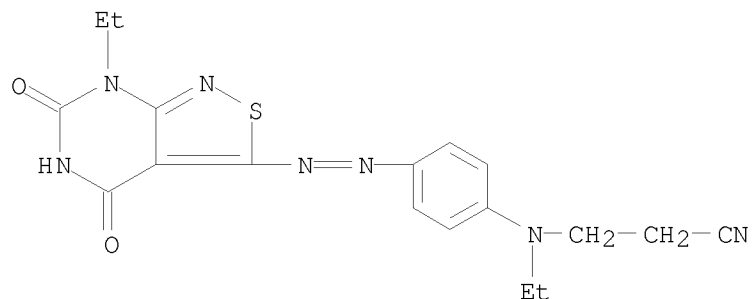
RL: IMF (Industrial manufacture); PREP (Preparation)

(preparation and acetate and polyester fiber dyeing by)

RN 55345-46-5 CAPLUS

CN Propanenitrile, 3-[ethyl[4-[(7-ethyl-4,5,6,7-tetrahydro-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)azo]phenyl]amino]- (9CI) (CA INDEX NAME)

10/141,986

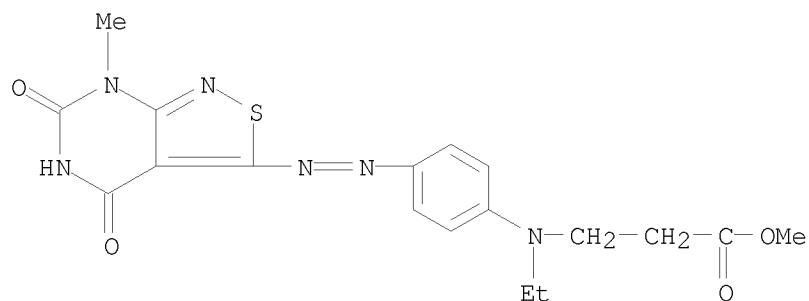


IT 55345-45-4P 55345-47-6P 55345-49-8P
55345-51-2P

RL: IMF (Industrial manufacture); PREP (Preparation)
(preparation and acetate, polyamide and polyester fiber dyeing by)

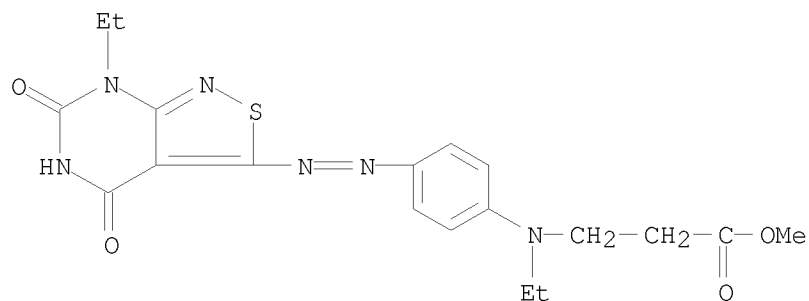
RN 55345-45-4 CAPLUS

CN β -Alanine, N-ethyl-N-[4-[(4,5,6,7-tetrahydro-7-methyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)azo]phenyl]-, methyl ester (9CI)
(CA INDEX NAME)



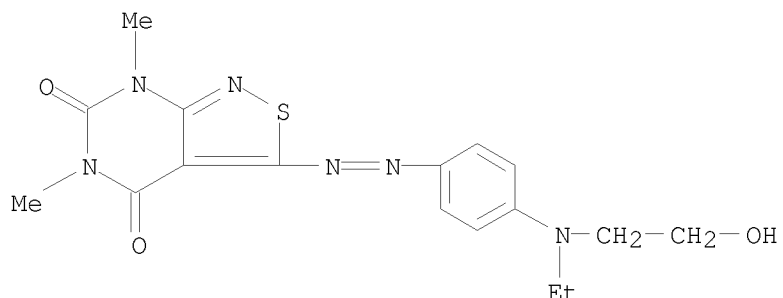
RN 55345-47-6 CAPLUS

CN β -Alanine, N-ethyl-N-[4-[(7-ethyl-4,5,6,7-tetrahydro-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)azo]phenyl]-, methyl ester (9CI)
(CA INDEX NAME)

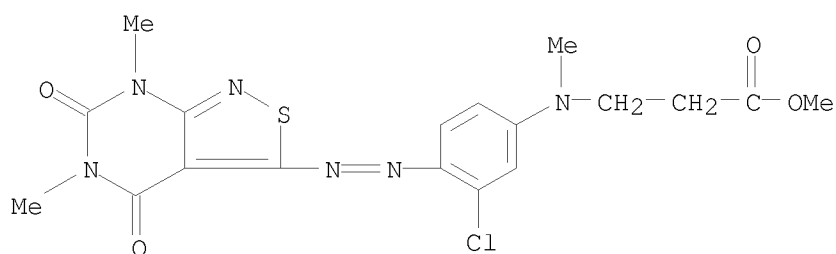


10/141,986

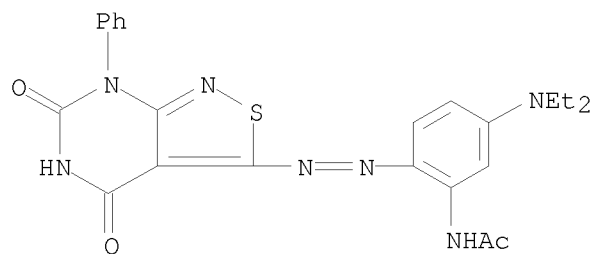
RN 55345-49-8 CAPLUS
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-[[4-[ethyl(2-hydroxyethyl)amino]phenyl]azo]-5,7-dimethyl- (9CI) (CA INDEX NAME)



RN 55345-51-2 CAPLUS
CN β -Alanine, N-[3-chloro-4-[(4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)azo]phenyl]-N-methyl-, methyl ester (9CI) (CA INDEX NAME)



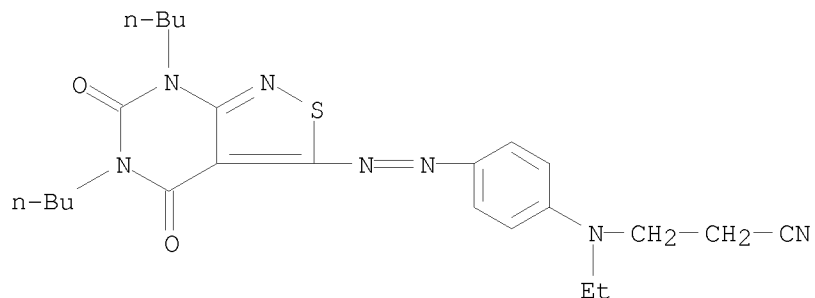
IT 55345-48-7P 55345-52-3P 55345-53-4P
55345-54-5P
RL: IMF (Industrial manufacture); PREP (Preparation)
(preparation and polyester fiber dyeing by)
RN 55345-48-7 CAPLUS
CN Acetamide, N-[5-(diethylamino)-2-[(4,5,6,7-tetrahydro-4,6-dioxo-7-phenylisothiazolo[3,4-d]pyrimidin-3-yl)azo]phenyl]- (9CI) (CA INDEX NAME)



RN 55345-52-3 CAPLUS
CN Propanenitrile, 3-[[4-[(5,7-dibutyl-4,5,6,7-tetrahydro-4,6-

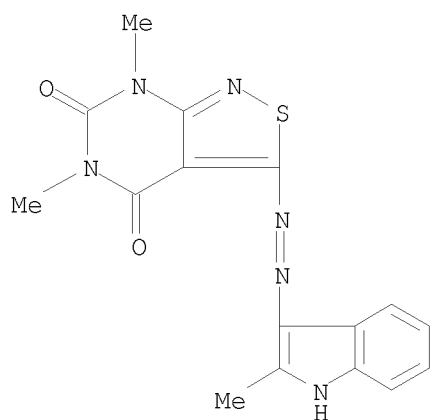
10/141,986

dioxoisothiazolo[3,4-d]pyrimidin-3-yl)azo]phenyl]ethylamino]- (9CI) (CA INDEX NAME)



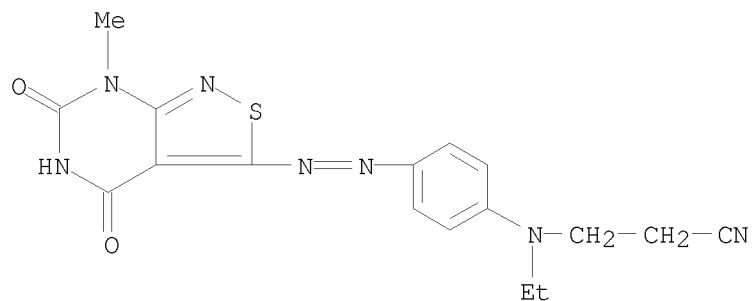
RN 55345-53-4 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 5,7-dimethyl-3-[(2-methyl-1H-indol-3-yl)azo]- (9CI) (CA INDEX NAME)



RN 55345-54-5 CAPLUS

CN Propanenitrile, 3-[ethyl[4-[(4,5,6,7-tetrahydro-7-methyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)azo]phenyl]amino]- (9CI) (CA INDEX NAME)



GI For diagram(s), see printed CA Issue.
AB Isothiazolopyrimidinedione azo dyes (I, R = H, Pr, Bu; R1 = Et, Ph, Pr, Bu; R2 = N,N-disubstituted p-aniline derivs., 2-methyl-3-indolyl) were prepared and were used to dye polyester, polyamide, and acetate fibers orange to violet shades. Thus, 3-amino-7-methylisothiazolo[3,4-d]pyrimidine-4,6-dione [52903-28-3] was diazotized and coupled with PhNEtCH₂CH₂CN [148-87-8] to give azo dye (II) [55345-54-5], bordeaux on polyester fibers. The other I were similarly prepared

L6 ANSWER 22 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 1975:170825 CAPLUS

DOCUMENT NUMBER: 82:170825

ORIGINAL REFERENCE NO.: 82:27301a,27304a

TITLE: Isothiazolo[3,4-d]- and pyrimido[4,5-d]-pyrimidines

AUTHOR(S): Niess, Rolf; Eilingsfeld, Heinz

CORPORATE SOURCE: Farbenlab., BASF A.-G., Ludwigshafen, Fed. Rep. Ger.

SOURCE: Justus Liebigs Annalen der Chemie (1975), Volume Date

1974, (12), 2019-29

CODEN: JLACBF; ISSN: 0075-4617

DOCUMENT TYPE: Journal

LANGUAGE: German

OTHER SOURCE(S): CASREACT 82:170825

IT 52903-28-3P 52903-29-4P 52903-30-7P

52903-31-8P 52903-32-9P 52903-33-0P

52903-35-2P 52903-36-3P 52903-37-4P

52903-38-5P 52903-40-9P 52903-41-0P

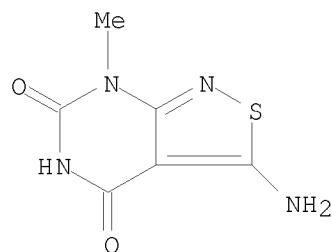
52903-42-1P 52956-48-6P

RL: SPN (Synthetic preparation); PREP (Preparation)

(preparation of)

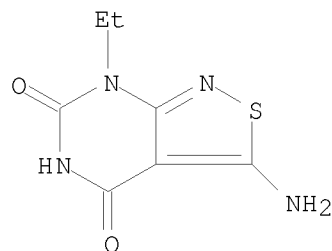
RN 52903-28-3 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-7-methyl- (CA INDEX NAME)



RN 52903-29-4 CAPLUS

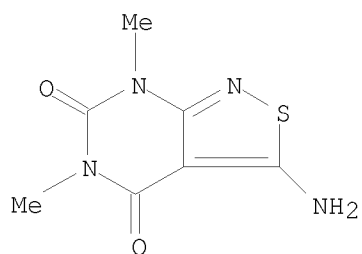
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-7-ethyl- (CA INDEX NAME)



RN 52903-30-7 CAPLUS

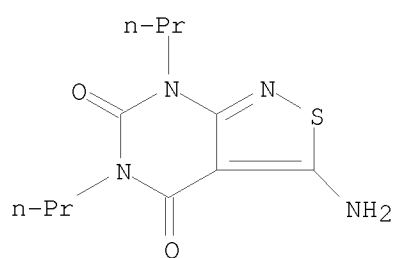
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-5,7-dimethyl- (CA INDEX NAME)

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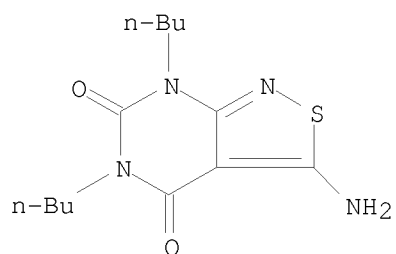
RN 52903-31-8 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-5,7-dipropyl- (CA INDEX NAME)



RN 52903-32-9 CAPLUS

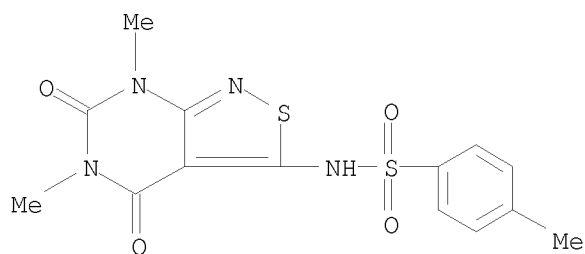
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-5,7-dibutyl- (CA INDEX NAME)



RN 52903-33-0 CAPLUS

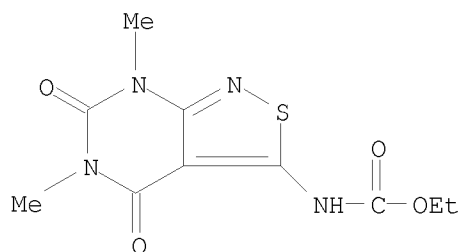
CN Benzenesulfonamide, 4-methyl-N-(4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)

10/141,986



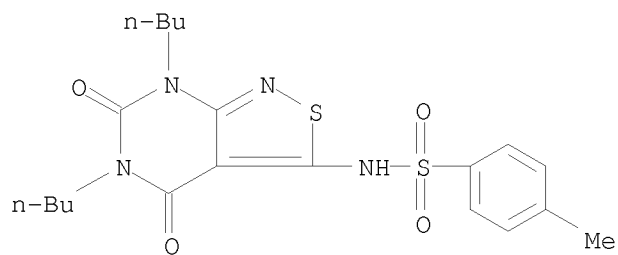
RN 52903-35-2 CAPLUS

CN Carbamic acid, (4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)-, ethyl ester (9CI) (CA INDEX NAME)



RN 52903-36-3 CAPLUS

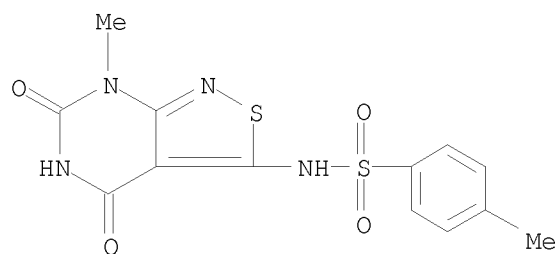
CN Benzenesulfonamide, N-(5,7-dibutyl-4,5,6,7-tetrahydro-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)-4-methyl- (CA INDEX NAME)



RN 52903-37-4 CAPLUS

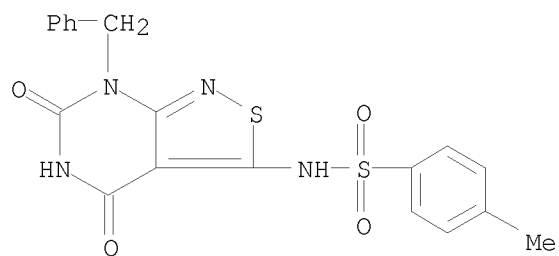
CN Benzenesulfonamide, 4-methyl-N-(4,5,6,7-tetrahydro-7-methyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)

10/141,986



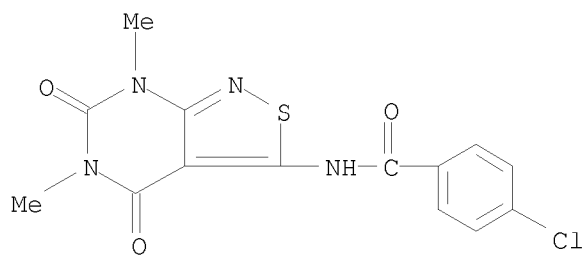
RN 52903-38-5 CAPLUS

CN Benzenesulfonamide, 4-methyl-N-[4,5,6,7-tetrahydro-4,6-dioxo-7-(phenylmethyl)isothiazolo[3,4-d]pyrimidin-3-yl]- (CA INDEX NAME)



RN 52903-40-9 CAPLUS

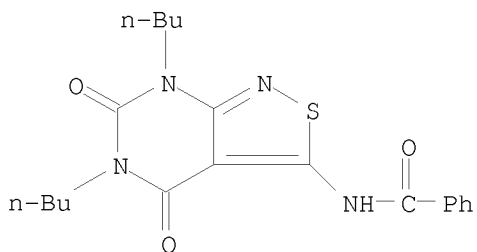
CN Benzamide, 4-chloro-N-(4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)



RN 52903-41-0 CAPLUS

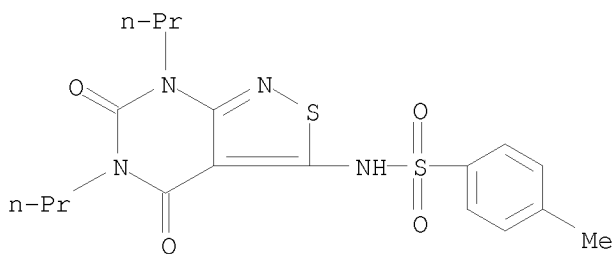
CN Benzamide, N-(5,7-dibutyl-4,5,6,7-tetrahydro-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)

10/141,986



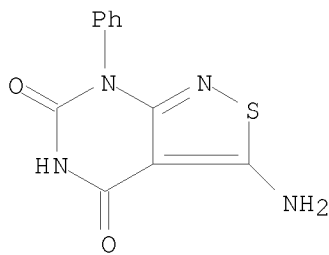
RN 52903-42-1 CAPLUS

CN Benzenesulfonamide, 4-methyl-N-(4,5,6,7-tetrahydro-4,6-dioxo-5,7-dipropylisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)



RN 52956-48-6 CAPLUS

CN	Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-7-phenyl-	(CA
	INDEX NAME)	



GI For diagram(s), see printed CA Issue.

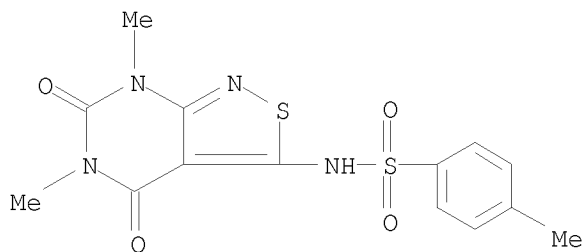
AB The isothiazolopyrimidines I (R = e.g. SMe, SCH₂Ph, NMe₂, morpholino, or Ph) and II (R₁ = e.g. H or Pr, R₂ = e.g. Me or Bu, R₃ = e.g. H, SO₂C₆H₄Me-4, or CO₂Et) were prepared by oxidative cyclization of the corresponding carboxamides III and IV (R₄ = CSNHR₃), resp. IV were prepared by reaction of IV (R₄ = H) (V) with R₃NCs. Reaction of V with R₅CONCS (R₅ = e.g. 4-O₂NC₆H₄) and cyclization gave the derivs. VI.

L6 ANSWER 23 OF 23 CAPLUS COPYRIGHT 2008 ACS on STN

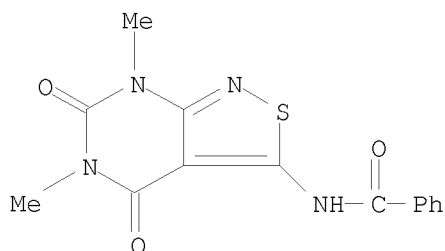
ACCESSION NUMBER: 1974:413488 CAPLUS
 DOCUMENT NUMBER: 81:13488
 ORIGINAL REFERENCE NO.: 81:2171a,2174a
 TITLE: 3-Aminoisothiazolo[3,4-d]pyrimidines
 INVENTOR(S): Niess, Rolf; Eilingsfeld, Heinz
 PATENT ASSIGNEE(S): BASF A.-G.
 SOURCE: Ger. Offen., 19 pp.
 CODEN: GWXXBX
 DOCUMENT TYPE: Patent
 LANGUAGE: German
 FAMILY ACC. NUM. COUNT: 1
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
DE 2248231	A1	19740411	DE 1972-2248231	19721002
CH 578008	A5	19760730	CH 1973-13917	19730928
FR 2201097	A1	19740426	FR 1973-35018	19731001
GB 1445697	A	19760811	GB 1973-45725	19731001
			DE 1972-2248231	A 19721002

PRIORITY APPLN. INFO.:
 IT 52903-33-0 52903-34-1 52903-35-2
 52903-36-3
 RL: RCT (Reactant); RACT (Reactant or reagent)
 (hydrolysis of)
 RN 52903-33-0 CAPLUS
 CN Benzenesulfonamide, 4-methyl-N-(4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)



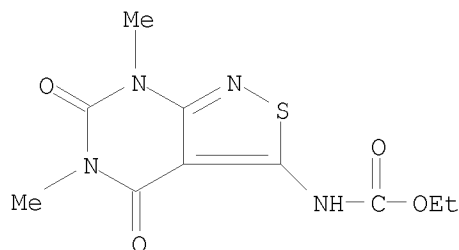
RN 52903-34-1 CAPLUS
 CN Benzamide, N-(4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)



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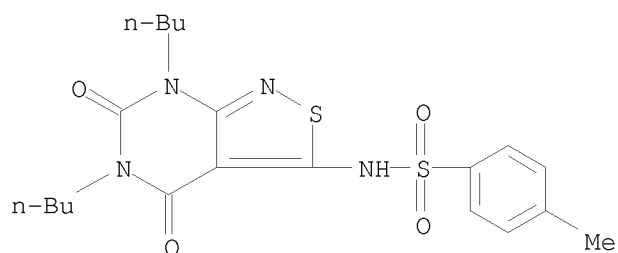
RN 52903-35-2 CAPLUS

CN Carbamic acid, (4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)-, ethyl ester (9CI) (CA INDEX NAME)



RN 52903-36-3 CAPLUS

CN Benzenesulfonamide, N-(5,7-dibutyl-4,5,6,7-tetrahydro-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)-4-methyl- (CA INDEX NAME)

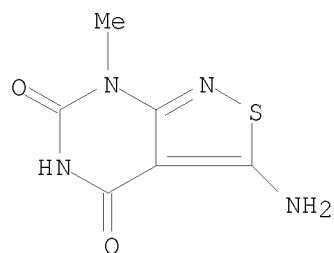


IT 52903-28-3P 52903-29-4P 52903-30-7P
52903-31-8P 52903-32-9P 52903-36-3P
52903-37-4P 52903-38-5P 52903-39-6P
52903-40-9P 52903-41-0P 52903-42-1P
52903-43-2P 52903-44-3P 52956-48-6P
52956-49-7P

RL: SPN (Synthetic preparation); PREP (Preparation)
(preparation of)

RN 52903-28-3 CAPLUS

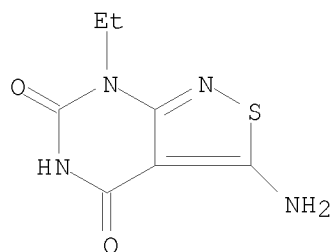
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-7-methyl- (CA INDEX NAME)



RN 52903-29-4 CAPLUS

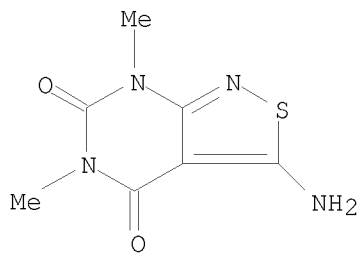
10/141,986

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-7-ethyl- (CA INDEX NAME)



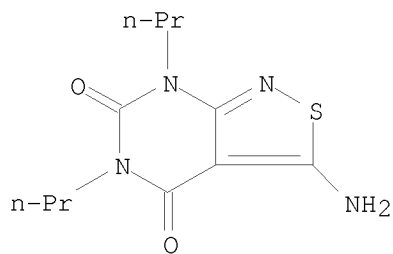
RN 52903-30-7 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-5,7-dimethyl- (CA INDEX NAME)



RN 52903-31-8 CAPLUS

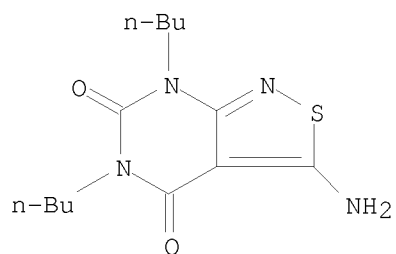
CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-5,7-dipropyl- (CA INDEX NAME)



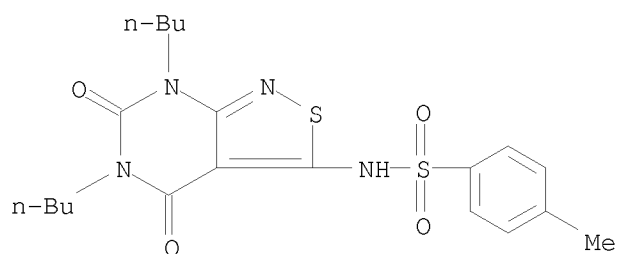
RN 52903-32-9 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-5,7-dibutyl- (CA INDEX NAME)

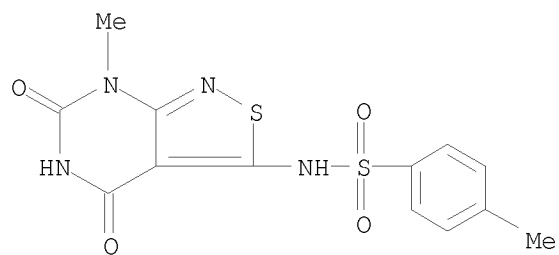
10/141,986



RN 52903-36-3 CAPLUS
CN Benzenesulfonamide, N-(5,7-dibutyl-4,5,6,7-tetrahydro-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)-4-methyl- (CA INDEX NAME)

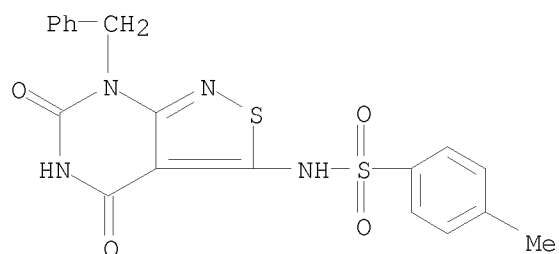


RN 52903-37-4 CAPLUS
CN Benzenesulfonamide, 4-methyl-N-(4,5,6,7-tetrahydro-7-methyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)

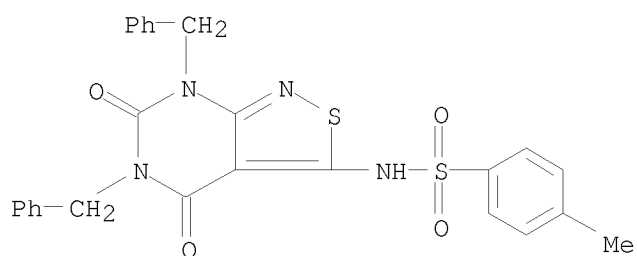


RN 52903-38-5 CAPLUS
CN Benzenesulfonamide, 4-methyl-N-[4,5,6,7-tetrahydro-4,6-dioxo-7-(phenylmethyl)isothiazolo[3,4-d]pyrimidin-3-yl]- (CA INDEX NAME)

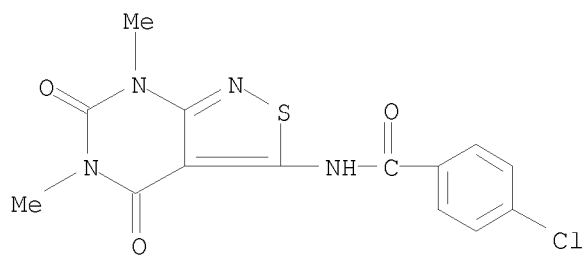
10/141,986



RN 52903-39-6 CAPLUS
CN Benzenesulfonamide, 4-methyl-N-[4,5,6,7-tetrahydro-4,6-dioxo-5,7-bis(phenylmethyl)isothiazolo[3,4-d]pyrimidin-3-yl]- (CA INDEX NAME)

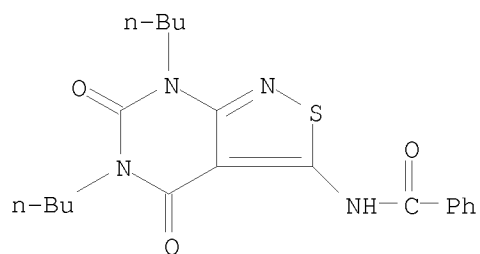


RN 52903-40-9 CAPLUS
CN Benzamide, 4-chloro-N-(4,5,6,7-tetrahydro-5,7-dimethyl-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)



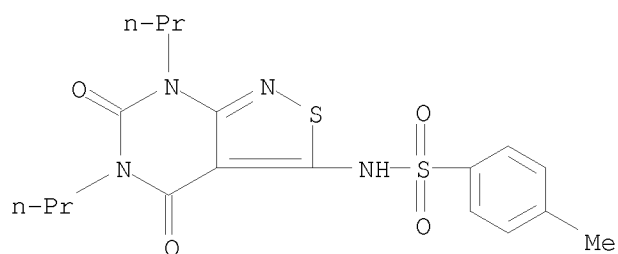
RN 52903-41-0 CAPLUS
CN Benzamide, N-(5,7-dibutyl-4,5,6,7-tetrahydro-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)

10/141,986



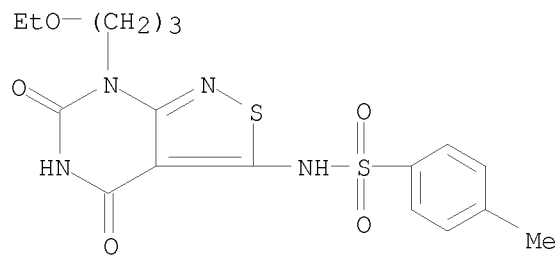
RN 52903-42-1 CAPLUS

CN Benzenesulfonamide, 4-methyl-N-(4,5,6,7-tetrahydro-4,6-dioxo-5,7-dipropylisothiazolo[3,4-d]pyrimidin-3-yl)- (CA INDEX NAME)



RN 52903-43-2 CAPLUS

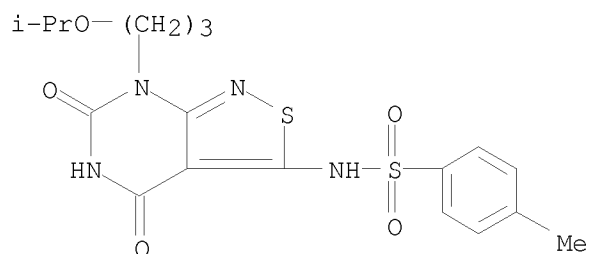
CN Benzenesulfonamide, N-[7-(3-ethoxypropyl)-4,5,6,7-tetrahydro-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl]-4-methyl- (CA INDEX NAME)



RN 52903-44-3 CAPLUS

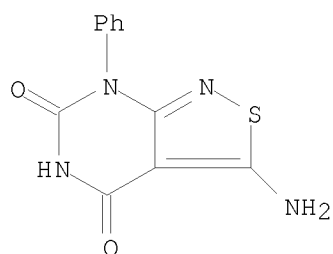
CN Benzenesulfonamide, 4-methyl-N-[4,5,6,7-tetrahydro-7-[3-(1-methylethoxy)propyl]-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl]- (CA INDEX NAME)

10/141,986



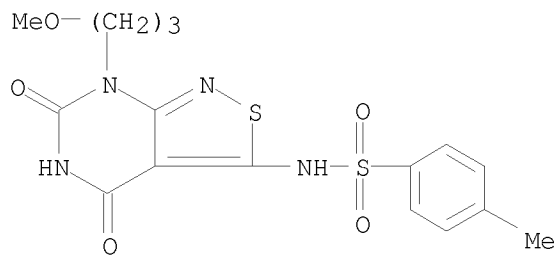
RN 52956-48-6 CAPLUS

CN Isothiazolo[3,4-d]pyrimidine-4,6(5H,7H)-dione, 3-amino-7-phenyl- (CA INDEX NAME)



RN 52956-49-7 CAPLUS

CN Benzenesulfonamide, 4-methyl-N-[4,5,6,7-tetrahydro-7-(3-methoxypropyl)-4,6-dioxoisothiazolo[3,4-d]pyrimidin-3-yl]- (CA INDEX NAME)



GI For diagram(s), see printed CA Issue.

AB Isothiazolopyrimidines I (R = H, Me, Bu, Pr, CH₂Ph; R₁ = Me, Et, Pr, Bu, Ph, CH₂Ph, (CH₂)₃OMe, (CH₂)₃OEt, (CH₂)₃-OCHMe₂; R₂ = H, SO₂C₆H₄Me-p; R = R₁ = Me, R₂ = CO₂-Et, COC₆H₄Cl-p, Bz, SO₂C₆H₄Me-p) were prepared by cyclizing II (R₂ ≠ H), which may be accompanied by hydrolysis of R₂. Thus, 88% I (R = R₂ = H, R₁ = Me) was obtained by cyclizing II (R = H, R₁ = Me, R₂ = SO₂C₆H₄Me-p) with H₂SO₄. Som I, especially I (R = R₁ = Me, R₂ = H, CO₂Et; R = R₁ = Pr, R₂ = H) had diuretic and antiinflammatory activities.

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=>

---Logging off of STN---

=>

Executing the logoff script...

=> LOG Y

COST IN U.S. DOLLARS	SINCE FILE	TOTAL
	ENTRY	SESSION
FULL ESTIMATED COST	143.75	322.74
DISCOUNT AMOUNTS (FOR QUALIFYING ACCOUNTS)	SINCE FILE	TOTAL
	ENTRY	SESSION
CA SUBSCRIBER PRICE	-18.40	-18.40

STN INTERNATIONAL LOGOFF AT 15:46:39 ON 03 JUL 2008